VOLUME 1

CHARLES COUNTY ANIMAL CARE CENTER

5690 PINEY CHURCH ROAD WALDORF, MARYLAND 20602 12/23/2019



SHEET

VOLUME I DRAWING INDEX

CODE ANALYSIS

SHEET NAME

TYPICAL ACCESSIBILITY GUIDELINES & ADA SIGNAGE DETAILS

SYMBOLS & TA	GS LEGEND		
TAG	DESCRIPTION		
(101A)	DOOR TAG		
CASEWORK SERIES CABINET DEPTH CASEWORK SERIES CABINET DEPTH CABINET DEPTH CABINET DEPTH CABINET HEIGHT WIDTH	CASEWORK TAG "CABINET DEPTH" SHALL BE MEASURED FROM FINISHED WALL TO CABINET FRAME		
1t	SPECIALTY EQUIPMENT TAG		
1 A	COLUMN LINE DESIGNATION TAG		
REFERENCE 0'-0"	LEVEL ELEVATION TAG		
	NORTH ARROW TAG T = TRUE NORTH P = PROJECT NORTH		
ROOM 101	ROOM NAME & NUMBER TAG		
1 A101	SECTION TAG		
1 A101	CALLOUT / DETAIL		
0'-0"	SPOT ELEVATION TAG		
DRAWING TITLE DRAWING SCALE	DETAIL / DRAWING TITLE TAG		
TYPE 1'-0" HEIGHT	CEILING TAG		
99	PARTITION TAG		
?	MATERIAL TAG		
Û	WINDOW TAG		
6:12	ROOF SLOPE ANNOTATION		
1 A101 0 0 0.0 0	ELEVATION TAG		
O O NEW DEMOLITION	SPECIFIC NOTE		

KEY TO MATERIALS					
PATTERN	DESCRIPTION				
	BRICK				
	CMU MASONRY				
	CONCRETE SECTION				
	POROUS FILL				
	EARTH				
	PLYWOOD				
	GYPSUM BOARD SECTION				
	RIGID INSULATION				
	BATT INSULATION				
	END GRAIN LUMBER				
	WOOD BLOCK OR SHIM				
	FINISH WOOD				

2 I MROF	_S		FIN	-	FINISH	PSF	-	POUNDS PER SQUARE FOOT
&	-	AND	FIN FL	-	FINISHED FLOOR	PSI	-	POUNDS PER SQUARE INCH
@ Φ	-	AT DIAMETER	FL FLEX	-	FLOOR	PT	-	PRESSURE TREATED
Ф	-	SQUARE	FLUOR	-	FLEXIBLE FLUORESCENT	PTD PVC	-	PAINTED POLYVINYL CHLORIDE
	-	SQUARE	FND	-	FOUNDATION		-	PAVEMENT
A			FPM	_	FEET PER MINUTE		_	PREFABRICATED WOOD TRU
AB	-	ANCHOR BOLT	FRT	-	FIRE RETARDANT TREATED			
ABV	-	ABOVE	FSK	-	FOIL SCRIM KRAFT	R		
ACOUST	-	ACOUSTICAL	FT	-	FEET, FOOT		-	RADIUS
ACT	-	ACOUSTIC CEILING TILE	FT	-	FLOOR TRANSITION	RCP	-	REFLECTED CEILING PLAN
AFF	-	ABOVE FINISH FLOOR	FTG	-	FOOTING		-	REINFORCING, REINFORCED
ahj Alum	-	AUTHORITY HAVING JURISDICTION ALUMINUM	G				-	RESINOUS REQUIRED
AP	-	ACCESS PANEL	GA	-	GAGE, GAUGE	REV	_	REVISION
¬. APPROX	_	APPROXIMATELY	GALV	_	GALVANIZED	RGD	_	RIGID
ARCH	-	ARCHITECTURAL	GL	-	GLASS, GLAZING	RM	-	ROOM
			GND	-	GROUND	RO	-	ROUGH OPENING
В			GRTG	-	GRATING	RST	-	REINFORCING STEEL
B.C.	-	BOTTOM CHORD	GWB	-	GYPSUM WALL BOARD	•		
BLK	-	BLOCK					•••••	CMART DOARD
	-	BUILDING BLOCKING	п Н	•••••	HIGH / HEIGHT	SB SCD	-	SMART BOARD SEE CIVIL DRAWINGS
BLKHD		BULKHEAD	HC	-	HANDICAPPED		-	SCHEDULE
BM	_	BEAM	HD	_	HEAD	_	_	STORM DRAIN
B.O.	-	BOTTOM OF	HM	-	HOLLOW METAL	SED	-	SEE ELECTRICAL DRAWINGS
BOD	-	BASIS OF DESIGN	HORIZ	-	HORIZONTAL		-	SECTION
ВОТ	-	ВОТТОМ	HR	-	HOUR	SF	-	SQUARE FOOT
B.R.	-	BULLET RESISTANT	HT	-	HEIGHT	SI	-	SQUARE INCH
BRNG	-	BEARING				SIM	-	SIMILAR
_					INCIDE DIAMETED	SLP	-	SLOPE SEE MECHANICAL DRAWING
c î	-	CENTER LINE	ID IN	-	INSIDE DIAMETER INCH		-	SEE MECHANICAL DRAWING SPECIAL
Ĺ CFCI	-	CENTER LINE CONTRACTOR FURNISHED,	IN INFO	-	INFORMATION	SPCL	-	SPECIAL SPECIFICATIONS
I		CONTRACTOR FORMISHED,	INSUL	_	INSULATION	SPLY	-	SUPPLY
CFOI	-	CONTRACTOR FURNISHED,			mod Little it	SQ	-	SQUARE
		OWNER INSTALLED	J				-	STAINLESS STEEL
CFLS	-	COUNTER FLASHING	JB	-	JUNCTION BOX	SSD	-	SEE STRUCTURAL DRAWING
CJ	-	CONTROL JOINT	JM	-	JAMB		-	STREET
	-	CLOSET	JST	-	JOIST	STD	-	STANDARD
CLG	-	CEILING	JT	-	JOINT	J	-	STEEL
CMU	-	CONCRETE MASONRY UNIT				STOR STRUCT	-	STORAGE
CND COL.	-	CONDUIT COLUMN	L LG	•••••	LONG	_	-	STRUCTURAL SURFACE
COOR		COORDINATE	LU	-	LIVE LOAD	SUSP		SUSPENDED
CONC			LSC		LIFE SAFETY CODE	_	_	SWITCH
CONSTR		CONSTRUCTION	LTG		LIGHTING	SYS	_	SYSTEM
	-	CONTINUOUS						2.2.2
с.т. / ст	٠.	CERAMIC TILE						
	-	CARPET / CARPET TILE	MACH		MACHINE		-	TOP AND BOTTOM
	-	COUNTERSUNK	MAT'L		MATERIAL	T.B.		
	-	CUBIC	MAX	-	MAXIMUM	T.B.D.		TO BE DETERMINED
CU FT CU YD		CUBIC FOOT CUBIC YARD	MBT MECH	-	MARBLE THRESHOLD MECH	TEMP THK		TEMPERATURE THICK
20 10	-	CODIC TARD	MEP	-	MECHANICAL / ELECTRICAL /			THRESHOLD
D					PLUMBING	T&G		TONGUE & GROOVE
D	-	DEEP / DEPTH	MFGR	-	MANUFACTURER		-	TOP OF
DEG	-	DEGRÉE	MH	-	MANHOLE	TOB	-	TOP OF BEARING POINT
DIA	-	DIAMETER	MIN	-	MINIMUM	TOC	-	TOP OF CONCRETE
MIC	-	DIMENSION	MO	-	MASONRY OPENING	TOF	-	TOP OF FOOTING
)L	-	DEAD LOAD	MSNRY		MASONRY	. •	-	TOP OF MASONRY
OMPR	-	DAMPER	M.T.		METAL THRESHOLD	TOP	-	TOP OF PAVEMENT, PARAPE
ON OR	-	DOWN DOOR	MTL MTD		METAL MOUNTED		-	TOP OF STEEL
DK DS	-	DOWNSPOUT	טווט	-	MOUNTED		-	TREATED TRANSITION STRIP
DS DTL	_	DETAIL	N				-	TYPICAL
OWG	-	DRAWING	NA	-	NOT APPLICABLE	- • •		
			NIC		NOT IN CONTRACT			
			NO	-	NUMBER	UGND	-	UNDERGROUND
ĒΑ	-	EACH	NTS	-	NOT TO SCALE	UL		
EIFS	-	EXTERIOR INSULATON AND	0				-	
II EC		FINISHING SYSTEM			ON CENTED	UON	-	UNLESS OTHERWISE NOTED
LEC L	-	ELECTRICAL ELEVATION	O/C OD	-	ON CENTER OUTSIDE DIAMETER	V		
ELEV	-	ELEVATION	OFIC	-	OWNER FURNISHED,		-	VAPOR BARRIER
	-	ELEVATION ELEVATOR MACHINE ROOM	OI IC		CONTRACTOR INSTALLED		-	
J	_	EXPANSION JOINT	OFOI	-		VERT		
ENT	-	ENTRANCE, ENTRY	-		OWNER INSTALLED	VIF	-	VERIFY IN FIELD
Q	-	EQUAL	OPNG		OPENING	VOL	-	VOLUME
EST	-	ESTIMATE		-	OPPOSITE			
W	-	EACH WAY	OPP HN		OPPOSITE HAND			
XST	-	EXISTING	• •	-	OVER	W	-	WIDE / WIDTH
XT	-	EXTERIOR	OVHD	-	OVERHEAD	,	-	WITHOUT
XP XP JT	-	EXPOSED EXPANSION JOINT	D			W/0 W.B.	-	WITHOUT WHITEBOARD
-VL 11	-	LVI VIANOINI TOIMI	P P.LAM		PLASTIC LAMINATE	WD.		MOOD
				-	PLYWOOD	WR	_	WATER RESISTANT
:	-	FAHRENHEIT	PLYWD		PLYWOOD	WTRPRF	-	WATERPROOF
D	-	FLOOR DRAIN	PNLBD		PANELBOARD		-	WELDED WIRE FABRIC
	-	FIRE EXTINGUISHER	PNT/ PT		PAINT	WWM		WELDED WIRE MESH
F.E.		FIRE EXTINGUISHER CABINET	POLYISC) -	POLYISOCYANURATE			
	-							
E.E. E.C. F	-	FINISHED FLOOR	PRESS	-	PRESSURE			
E.C. F F EL	-	FINISHED FLOOR ELEVATION	PROJ	-	PROJECT			
.E.C. F	-		PROJ					

THIS LIST OF ABBREVIATIONS IS A GUIDE TO ABBREVIATIONS WHICH MAY BE USED IN THESE DOCUMENTS. ABBREVIATIONS

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PROJECT TEAM

MANNS WOODWARD STUDIOS
10839-D PHILADELPHIA ROAD
WHITE MARSH MARYLAND 211
PHONE: 410-344-1460
FAX: 443-403-2460
WWW.MWSARCH.COM

STRUCTURAL ENGINEERING
MINCIN PATEL MILANO, INC.
6511 HARFORD ROAD
BALTIMORE, MARYLAND 21214
PHONE: 410-254-7500
FAX: 410-254-7100
WWW.MPM-ENG.COM

ANIMAL CARE CONSULTANT
SHELTER PLANNERS OF AMERICA
1106 WEST RANDOL MILL ROAD, SUITE 300
ARLINGTON, TEXAS 76012
PHONE: 817-265-8522
WWW.SHELTERPLANNERSOFAMERICA.COM

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FAX: 302-738-7175

WWW.DEDC-ENG.COM

BEN DYER ASSOCIATES, INC.

LA PLATA, MARYLAND 20646

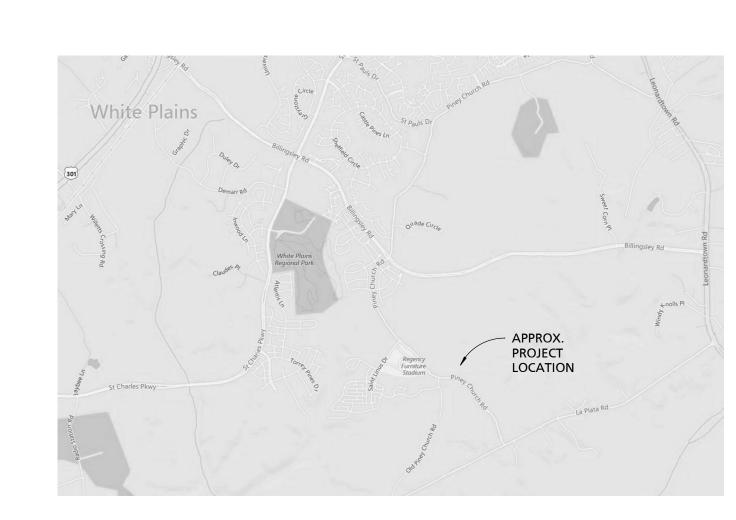
9375 CHESAPEAKE STREET, SUITE 227

CIVIL ENGINEERING

PHONE: 301-392-3651

WWW.BENDYER.COM

P.O. BOX 2727



VICINITY MAP

G003	GENERAL PROJECT NOTES & UL ASSEMBLIES
G004	GENERAL PROJECT NOTES & OL ASSEMBLIES
ARCHITECTURAL	- NEW WORK
A100	ARCHITECTURAL SITE PLAN
A101	REFERENCE PLAN
A102	DIMENSION PLAN
A103	BUILDING ASSEMBLY TYPES & DETAILS
A104	SLAB/BEARING DIAGRAM
A105	PLAN DETAILS
A106	FINISH PLAN
A107	FINISH SCHEDULE & DETAILS
A108	FFE PLAN
A109	FFE SCHEDULES & NOTES
A200	BUILDING ELEVATIONS - MAIN WING
A201	BUILDING ELEVATIONS - DOG WING
A300	BUILDING SECTIONS - MAIN WING
A301	BUILDING SECTIONS - MAIN WING
A302	BUILDING SECTIONS - DOG WING
A400	WALL SECTIONS
A401	WALL SECTIONS
A402	WALL SECTIONS
A403	WALL SECTIONS
A404	WALL SECTIONS
A405	WALL SECTIONS
A406	EXTERIOR STAIR DETAILS
A500	ROOF PLAN
A500	ROOF EDGE DETAILS
A501	ROOF EDGE DETAILS ROOF EDGE DETAILS
A600	DOOR & WINDOW SCHEDULE & TYPES
A600	HOLLOW METAL DOOR & WINDOW DETAILS
A602	SPECIALTY DOOR DETAILS
A603	STOREFRONT ELEVATIONS
A604	STOREFRONT DETAILS
A605	DOOR HARDWARE
A700	TYPICAL EQUIPMENT & CASEWORK DETAILS
A700	ENLARGED PLANS & INT. ELEVATIONS
A701	ENLARGED PLANS & INT. ELEVATIONS ENLARGED PLANS & INT. ELEVATIONS
A702	ENLARGED PLANS & INT. ELEVATIONS ENLARGED PLANS & INT. ELEVATIONS
A703	ENLARGED DOG RUN PLANS & ELEVATIONS
A704 A705	ENLARGED DOG RUN DETAILS
A800	REFLECTED CELLING PLAN
A900	ACCESSORY BUILDINGS CODE ANALYSIS (NOT INCLUDED IN SET - UNDER SEPARATE PERMIT)
A901	BARN - PLANS & SECTIONS (NOT INCLUDED IN SET - UNDER SEPARAT
]	PERMIT)
A902	BARN - ELEVATIONS (NOT INCLUDED IN SET - UNDER SEPARATE
4003	PERMIT)
A903	CARPORT (NOT INCLUDED IN SET - UNDER SEPARATE PERMIT)
A904	PAVILION (NOT INCLUDED IN SET - UNDER SEPARATE PERMIT)
A905	SITE DETAILS
ARCHITECTURAL	
A1001	ALTERNATE 004 - SPAY/NEUTER CLINIC
A1002	ALTERNATE 005 - OUTDOOR DOG RUN DOORS
STRUCTURAL - NI	EW WORK
S101	FOUNDATION/FIRST FLOOR PLAN
S102	ROOF FRAMING PLAN
\$103	UPPER ROOF FRAMING PLAN
S104	ENLARGED PIERS
S105	SLAB PLANS
S106	ENLARGED PLANS
S201	GENERAL NOTES & SCHEDULES
\$301	TYPICAL DETAILS
\$302	TYPICAL DETAILS
S401	SECTIONS
S402	SECTIONS
S403	SECTIONS
S404	SECTIONS
MECHANICAL - N M000	MECHANICAL TITLE SHEET
M101	HVAC NEW WORK PLAN
M102	LOW ROOF HVAC PLAN
M201	HVAC REFLECTED CEILING PLAN
M601	HVAC SCHEDULES
	HVAC SCHEDULES HVAC SCHEDULES
M602	
M602 M603	HVAC SCHEDULES
M602 M603 M604	AHU SCHEDULES - ANIMAL SYSTEMS
M602 M603 M604 M605	AHU SCHEDULES - ANIMAL SYSTEMS AHU SCHEDULES - ANIMAL SYSTEMS
M602 M603 M604	AHU SCHEDULES - ANIMAL SYSTEMS

SHEET	
NUMBER	SHEET NAME
MECHANICAL - ALTER	
M1001	ALTERNATE 004 - SPAY/NEUTER CLINIC
M1002	ALTERNATE 005 - OUTDOOR DOG RUN DOORS
PLUMBING - NEW WO	RK
P101	SANITARY WASTE & VENT FLOOR PLAN
P102	DOMESTIC WATER FLOOR PLAN
P103	NATURAL GAS FLOOR PLAN
P201	ROOF PLUMBING PLAN
P301	SANITARY/VENT RISER DIAGRAM
P302	DOMESTIC RISER DIAGRAM
P303	NATURAL GAS RISER DIAGRAM
P401	PLUMBING SCHEDULES
P601	PLUMBING DETAILS
PLUMBING - ALTERNA	TES
P1001	ALTERNATE 004 - SPAY/NEUTER CLINIC
P1002	ALTERNATE 005 - OUTDOOR DOG RUN DOORS
FIRE PROTECTION - NE	W WORK
F101	FIRE PROTECTION PLAN
FIRE PROTECTION - AL	TERNATE
F1001	ALTERNATE 004 - SPAY/NEUTER CLINIC
ELECTRICAL - NEW WO)RK
	ELECTRICAL SYMBOLS AND ABBREVIATIONS
E000	
E000 E101	ELECTRICAL SYMBOLS AND ABBREVIATIONS
E000 E101 E102	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN
E000 E101 E102 E201	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN
E000 E101 E102 E201 E301	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN
E000 E101 E102 E201 E301	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN
E000 E101 E102 E201 E301 E302 E303	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS
E000 E101 E102 E201 E301 E302 E303 E601	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL ROOF POWER PLAN
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E000 E101 E102 E201 E301 E302 E303 E601	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL ROOF POWER PLAN ELECTRICAL SCHEDULES ELECTRICAL SINGLE LINE AND DETAILS
E000 E101 E102 E201 E301 E302 E303 E601 E701	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL ROOF POWER PLAN ELECTRICAL SCHEDULES ELECTRICAL SINGLE LINE AND DETAILS
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E000 E101 E102 E201 E301 E302 E303 E601 E701 ELECTRICAL - ALTERNA E1001 E1002	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL ROOF POWER PLAN ELECTRICAL SCHEDULES ELECTRICAL SINGLE LINE AND DETAILS ATES SPAY/NEUTER CLINIC OUTDOOR DOG RUN AND GENERATOR
E000 E101 E102 E201 E301 E302 E303 E601 E701 ELECTRICAL - ALTERNA E1001 E1002	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL ROOF POWER PLAN ELECTRICAL SCHEDULES ELECTRICAL SINGLE LINE AND DETAILS ATES SPAY/NEUTER CLINIC OUTDOOR DOG RUN AND GENERATOR
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E000 E101 E102 E201 E301 E302 E303 E601 E701 ELECTRICAL - ALTERNA E1001 E1002 SPECIALTY SYSTEMS -	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL ROOF POWER PLAN ELECTRICAL SCHEDULES ELECTRICAL SINGLE LINE AND DETAILS ATES SPAY/NEUTER CLINIC OUTDOOR DOG RUN AND GENERATOR NEW WORK SPECIALTY SYSTEMS
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E000 E101 E102 E201 E301 E302 E303 E601 E701 ELECTRICAL - ALTERNA E1001 E1002 SPECIALTY SYSTEMS - SS100 VOI	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL ROOF POWER PLAN ELECTRICAL SCHEDULES ELECTRICAL SINGLE LINE AND DETAILS ATES SPAY/NEUTER CLINIC OUTDOOR DOG RUN AND GENERATOR NEW WORK SPECIALTY SYSTEMS LUME II DRAWING INDEX
E000 E101 E102 E201 E301 E302 E303 E601 E701 ELECTRICAL - ALTERNA E1001 E1002 SPECIALTY SYSTEMS - SS100	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL ROOF POWER PLAN ELECTRICAL SCHEDULES ELECTRICAL SINGLE LINE AND DETAILS ATES SPAY/NEUTER CLINIC OUTDOOR DOG RUN AND GENERATOR NEW WORK SPECIALTY SYSTEMS LUME II DRAWING INDEX
E000 E101 E102 E201 E301 E302 E303 E601 E701 ELECTRICAL - ALTERNA E1001 E1002 SPECIALTY SYSTEMS - SS100 VOI SHEET NUMBER	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL ROOF POWER PLAN ELECTRICAL SCHEDULES ELECTRICAL SINGLE LINE AND DETAILS ATES SPAY/NEUTER CLINIC OUTDOOR DOG RUN AND GENERATOR NEW WORK SPECIALTY SYSTEMS LUME II DRAWING INDEX
E000 E101 E102 E201 E301 E302 E303 E601 E701 ELECTRICAL - ALTERNA E1001 E1002 SPECIALTY SYSTEMS - SS100 VOI SHEET NUMBER CIVIL - NEW WORK	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL ROOF POWER PLAN ELECTRICAL SCHEDULES ELECTRICAL SINGLE LINE AND DETAILS ATES SPAY/NEUTER CLINIC OUTDOOR DOG RUN AND GENERATOR NEW WORK SPECIALTY SYSTEMS LUME II DRAWING INDEX
E000 E101 E102 E201 E301 E302 E303 E601 E701 ELECTRICAL - ALTERNA E1001 E1002 SPECIALTY SYSTEMS - SS100 VOI SHEET NUMBER CIVIL - NEW WORK 6.001-Y	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL SCHEDULES ELECTRICAL SINGLE LINE AND DETAILS ATES SPAY/NEUTER CLINIC OUTDOOR DOG RUN AND GENERATOR NEW WORK SPECIALTY SYSTEMS TITLE SHEET
E000 E101 E102 E201 E301 E302 E303 E601 E701 ELECTRICAL - ALTERNA E1001 E1002 SPECIALTY SYSTEMS - SS100 VOI SHEET NUMBER	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL SCHEDULES ELECTRICAL SCHEDULES ELECTRICAL SINGLE LINE AND DETAILS ATES SPAY/NEUTER CLINIC OUTDOOR DOG RUN AND GENERATOR NEW WORK SPECIALTY SYSTEMS SHEET NAME TITLE SHEET SITE PLAN
E000 E101 E102 E201 E301 E302 E303 E601 E701 ELECTRICAL - ALTERNA E1001 E1002 SPECIALTY SYSTEMS - SS100 VOI SHEET NUMBER CIVIL - NEW WORK 6.001-Y 6.002-Y	ELECTRICAL SYMBOLS AND ABBREVIATIONS ELECTRICAL SITE PLAN FOOTCANDLE ANALYSIS SITE PLAN ELECTRICAL FIRST FLOOR LIGHTING PLAN ELECTRICAL FIRST FLOOR POWER PLAN ELECTRICAL BARN AND CARPORT POWER & LIGHTING PLANS ELECTRICAL ROOF POWER PLAN ELECTRICAL SCHEDULES ELECTRICAL SINGLE LINE AND DETAILS ATES SPAY/NEUTER CLINIC OUTDOOR DOG RUN AND GENERATOR NEW WORK SPECIALTY SYSTEMS TITLE SHEET

STORMWATER MANAGEMENT DETAILS
STORMWATER MANAGEMENT DETAILS
PROPOSED DRAINAGE AREA MAPS
EXISTING DRAINAGE AREA MAP

SEDIMENT & EROSION CONTROL PLAN

GEOTECH RECOMMENDATIONS

SEDIMENT & EROSION CONTROL DETAILS

VOLUME III DRAWING INDEX

SHEET NAME

ACCESSORY BUILDINGS CODE ANALYSIS (UNDER SEPARATE PERMIT)

BARN - PLANS AND SECTIONS (UNDER SEPARATE PERMIT)

BARN - ELEVATIONS (UNDER SEPARATE PERMIT)

VOLUME 3 DRAWINGS, BOUND UNDER SEPARATE COVER, FORM AN INTEGRAL

VOLUME 3 CONSISTS OF CERTAIN DRAWINGS THAT WERE EXCLUDED FROM THE

CONTRACTOR TO OBTAIN SEPARATE BUILDING PERMITS FOR THOSE ITEMS OF

CARPORT (UNDER SEPARATE PERMIT)
PAVILION (UNDER SEPARATE PERMIT)

BUILDING PERMIT APPLICATION, AND WILL REQUIRE THE GENERAL

WORK AS A PART OF THIS CONTRACT FOR CONSTRUCTION. VOLUME 3 DRAWINGS ARE ENUMERATED ON THE COVER SHEET OF THE VOLUME 3

SITE DETAILS

LANDSCAPE PLAN
BORING LOGS

COVER SHEET

PART OF THESE BID DOCUMENTS.

6.014-Y

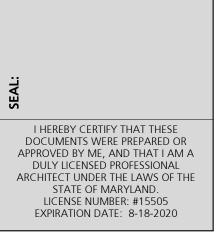
NUMBER

SITE BUILDINGS

DRAWING SET

WATER & SANITARY PLAN
WATER & SANITARY PROFILE







RLES COUNTY ANIMAL CARE CENTER
D PINEY CHURCH ROAD
LDORF, MARYLAND 20602

NO. DESCRIPTION DATE
2 PERMIT COMMENT 05-05-20

PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE:
COVER SHEET

SHEET NUMBER:

PROJECT APPLICABLE CODES						
CHARLES COUNTY ANIMAL CARE CENTER	INTERNATIONAL BUILDING CODE	2018				
PINEY CHURCH ROAD	INTERNATIONAL ENERGY CONSERVATION CODE	2018				
WALDORF, MARYLAND 20602	INTERNATIONAL MECHANICAL CODE	2018				
	INTERNATIONAL PLUMBING CODE	2018				
	NATIONAL ELECTRIC CODE	2014				
	INTERNATIONAL FUEL GAS CODE	2018				
	MARYLAND ACCESSIBILITY CODE					
	MARYLAND SAFETY GLAZING LAW					
	NFPA 101: LIFE SAFETY	2018				

PROJECT DESCRIPTION

THIS PROJECT IS A NEW ANIMAL CARE CENTER FOR CHARLES COUNTY. IT CONTAINS MULTIPLE STRUCTURES INCLUDING THE MAIN FACILITY, A BARN, A CARPORT, AND A PAVILION. THE MAIN BUILDING IS A MIXTURE OF CONVENTIONAL CONSTRUCTION AND A PRE-MANUFACTURED BUILDING SYSTEM USED FOR THE "DOG-WING". THE ENTIRE FACILITY IS CLASSIFIED AS A TYPE II B SINGLE BUILDING AND WILL BE FULLY SPRINKLERED. THE REMAINING STRUCTURES ARE ALL PRE-MANUFACTURED BUILDING SYSTEMS AND WILL NOT BE SPRINKLEREDY THE CARPORT AND PAVILION ARE OPEN-AIR STRUCTURES. THE BARN WILL BE USED FOR AGRICULTURAL ANIMAL HOLDING AND STORAGE: THE BARN, CARPORT, AND PAVILION WILL BE SUBMITTED UNDER SEPARATE PERMITS. THE MAIN BUILDING CONTAINS A LOBBY, ANIMAL HOLDING, SUPPORT SPACES FOR THE ANIMALS, AN EDUCATION CENTER, AN AREA FOR A FUTURE SPRAY/NEUTER CLINIC, ADMINISTRATION OFFICES, AND A SALLEYPORT. THESE SPACES ARE SEPARATED IN PUBLIC SPACES OR PRIVATE SPACES WHERE THE PUBLIC WILL NOT BE ALLOWED ACCESS, REFER TO THE CODE PLAN FOR CLARIFICATION.

CODE ANALYSIS - MAIN FACILITY	Y		
USE CLASSIFICATION (IBC CHAPTER 3)	CONSTRUCTION TYPE - CHAPTER 6		
MAIN BUILDING: NON-SEPARATED MIXED USE B: BUSINESS ANIMAL HOSPITAL, KENNELS, & POUNDS, EDUCATION CENTER (PER 303.1.2) S-1: MOD-HAZ STOR MOTOR VEHICLE COMPLYING W/ MIN. HAZ MAT.	REQUIRED FIRE-RESISTANCE FOR BUILDING	FULLY-SPRINKLERED <u>G ELEMENTS (IBC TABLE 601)</u> <u>MAIN BLDG</u> 0	
OCCUPANCY CLASSIFICATION (IBC TABLE 1004.1.2)	BEARING WALLS		
MAIN BUILDING: NON-SEPARATED MIXED OCCUPANCY OCCUPANCY: OCC. LOAD FACTOR:	EXTERIOR INTERIOR NONBEARING WALLS	0	
BUSINESS 100 GROSS (PER NFPA) STORAGE 300 GROSS	EXTERIOR INTERIOR	0	
WAREHOUSE 500 GROSS	FLOOR CONSTRUCTION	0	
ASSEM. (UC) 15 NET	ROOF CONSTRUCTION	0	
ALLOWABLE HEIGHT & AREA	FIRE PROTECTION SYSTEM REQUIREMEN	NTS (IBC CHAPTER 9)	
MAIN BUILDING:	ELEMENT	REQUIRED	
MAXIMUM HEIGHT (IBC TABLE 504.3): 75'-0"	903 AUTOMATIC SPRINKLERS	YES	
MAXIMUM STORIES: (IBC TABLE 504.4) 4-STORIES	904 FIRE EXTINGUISHER SYSTEM	NO	
MAXIMUM AREA (IBC TABLE 506.2): 92,000 SF	905 STANDPIPE SYSTEM	NO	
	906 PORTABLE FIRE EXTINGUISHERS	YES	
PROPOSED HEIGHT: 24'-0" / 1-STORY	907 FIRE ALARM SYSTEMS	YES	
PROPOSED AREA: 21,200 SF	908 EMERGENCY ALARM SYSTEM	NO	
DECLUDED CEDADATION (IDC FOO)	909 SMOKE CONTROL SYSTEM	NO	
REQUIRED SEPARATION (IBC 508)	910 SMOKE & HEAT REMOVAL	NO NO	
B / S-2 = NONE REQUIRED. 1-HR PROVIDED BETWEEN THE SALLEYPORT (S-2) AND BUSINESS AREAS.	911 FIRE COMMAND CENTER 912 FIRE DEPARTMENT CONNECTION	NO YES	
JALLET FORT (3-2) AIND BUSHINESS AREAS.	913 FIRE PUMP	NO	
INCIDENTAL USES (IBC 509.4.2)	914 FIRST RESPONDER SAFETY	YES	
LAUNDRY > 100SF = SMOKE w/ AUTOMATIC SPRINKLER	915 CARBON MONOXIDE	NO	
	2.5 5 5	• • •	

CLASSIFICATION	IBC
	REFERENC

DISTANCE REQUIREMENTS

CLASSIFICATION	IBC		NFPA		PROPOSED	
	REFERENCE	ALLOWABLE	REFERENCE	ALLOWABLE		
COMMON PATH	TABLE 1006.2.1	100'-0"	38.2.5.3.1	100'-0"	69'-9"	
- SINGLE EXIT ACCESS	TABLE 1006.3.3(2)	75'-0")	
TRAVEL DISTANCE FOR B	TABLE 1017.2	300\0"	38.2 6.3	300\0"	124\1"	
TRAVEL DISTANCE FOR S-1	TABLE 1017.2	250'-0"	TABLE 42.2.6	400'-0"	52'-0"	
DEAD END CORRIDORS	1020.4 (EXCEPT.2)	50'-0"	38.2.5.2.1	50'-0"	22'-10"	
CORRIDOR WIDTH	TABLE 1020.2	44"	38.2.3.2	44"	(64" TYP)	
EXIT SEPARATION DISTANCE	1007.1.1(2)	1/3 OF DIAG.	7.5.1.3.3	1/3 OF DIAG.	REFER TO CODE PLAN	

SINGLE MEANS OF EXIT ACCESS

SINGLE EXIT ACCESS PATH SHALL BE PERMITTED WHEN COMMON PATH DISTANCE DOES NOT EXCEED NFPA 38.2.5.3.1.

SINGLE EXIT ACCESS PATH SHALL BE PERMITTED WHEN COMMON PATH DISTANCE DOES NOT EXCEED TABLE 1006.3.3(2) AND THE OCCUPANT LOAD DOES NOT EXCEED 49.

REQUIRED NUMBER OF PLUMBING FIXTURES BASED ON ACTUAL OCCUPANCY OF THE BUILDING PER IPC 403.1.

ACTUAL OCCUPANCY COUNTS

SALLEYPORT (STORAGE) = 2 OCCUPANTS MAX

BUSINESS AREAS (BUSINESS) = 38 TOTAL FROM BREAKDOWN BELOW 17 STAFF = 14 SHELTER STAFF MEMBERS + 3 SURGERY STAFF)

21 VISITORS = 14 VISITORS FOR EXISTING SHELTER * 1.43 RATIO BASED ON NEW SHELTER INCREASE (EXISTING SHELTER HOUSES 3,500 ANIMALS. NEW SHELTER TO INCREASE BY 1,500 ANIMALS) EDUCATION CENTER (ASSEM) = 40 PERSONS MAX

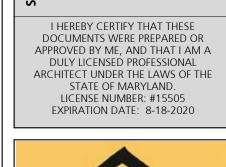
AREA	OCC.#	IPC OCC. #	W.CL. M.	W.CL. F.	LAV. M.	LAV. F.	B/S	DF	OTHER
STORAGE	2	1 M / 1 F	1/100 = 1	1/100 = 1	1/100 = 1	1/100 = 1	-	1/1000 = 1	1 SS
BUSINESS	38	19 M / 19 F	1/25 = 1	1/25 = 1	1/40 = 1	1/40 = 1	-	1/100 = 1	1 SS
ASSEMB.	40	20 M / 20 F	1/125 = 1	1/65 = 1	1/200 = 1	1/200 = 1	-	1/500 = 1	1 SS
		REQUIRED	3	3	3	3	0	1	1 SS
		PROVIDED	3	3	3	3	1	2	2 SS

	FIRE SEPARATION DISTANCE - IBC TABLE 602	HAZARD GROUP - IBC 307.5			
	NO FIRE-RESISTANCE RATING IS REQUIRED AT THE EXTERIOR WALLS BECAUSE THE MAIN BUILDING & BARN ARE MORE THAN 10'-0" SEPARATED AND ARE	THE OXYGEN WITHIN THE PROCEDURE ROOM SHALL BE CLASSIFIED AS OXIDIZING GASES.			
>	TYPE IIB AND VB, AND ARE USE B AND U.	MAX. ALLOWABLE HAZARDOUS MATERIAL QUANTITY - IBC TABLE 307.1(1)			
	BUILDINGS ON SAME LOT - IBC 705.5	THE GAS MAY BE STORED AT VOLUMES UP TO 3,000 SF IN A SPRINKLERED BUILDING BEFORE BEING TREATED AS AN H-3 OCCUPANCY. THE COUNTY WI			
1	\	PULL DING RECORE BEING TREATED AS AN HIS OCCURANCY. THE COUNTY WILL			

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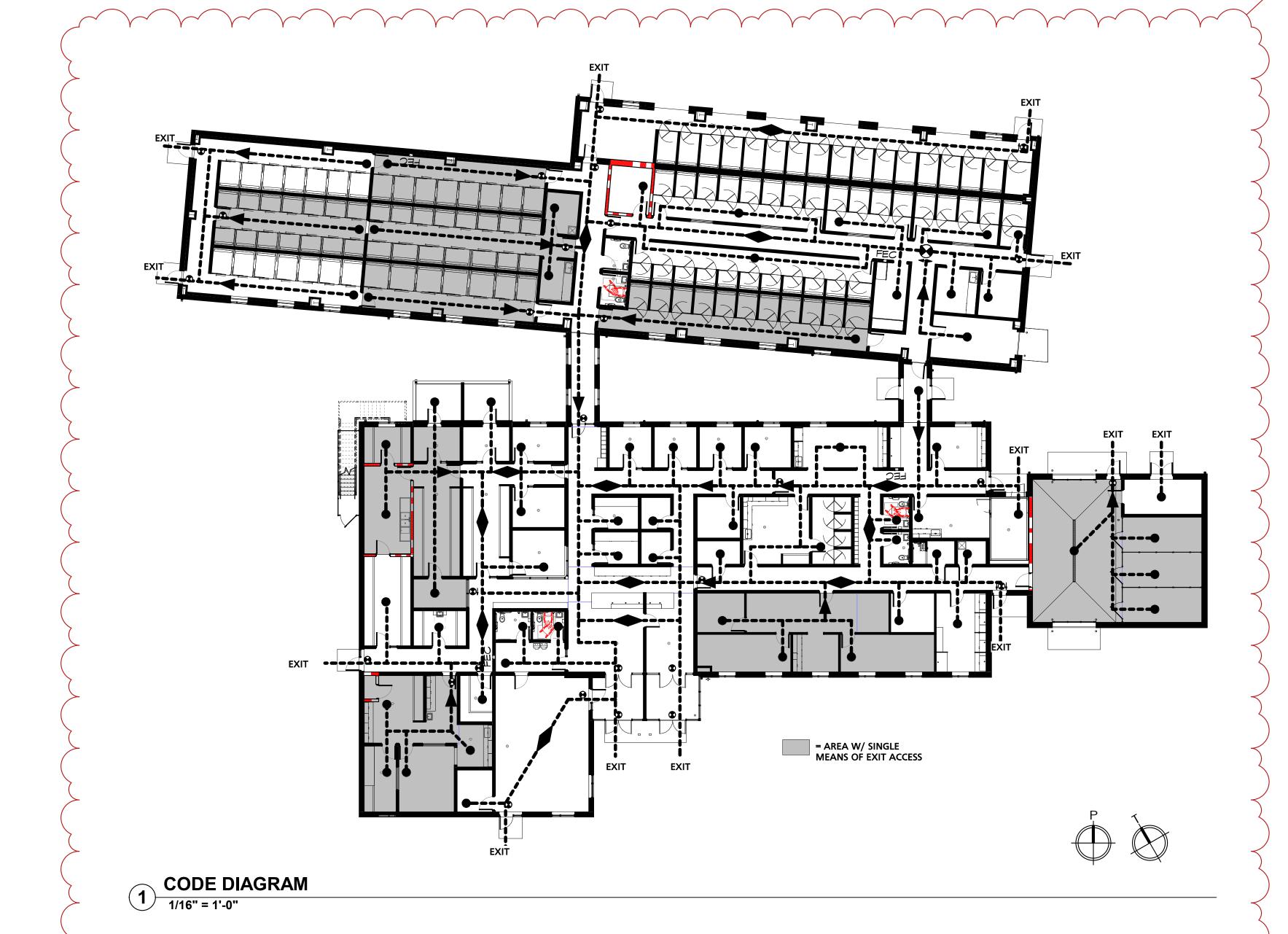


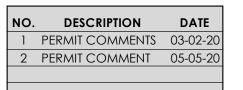
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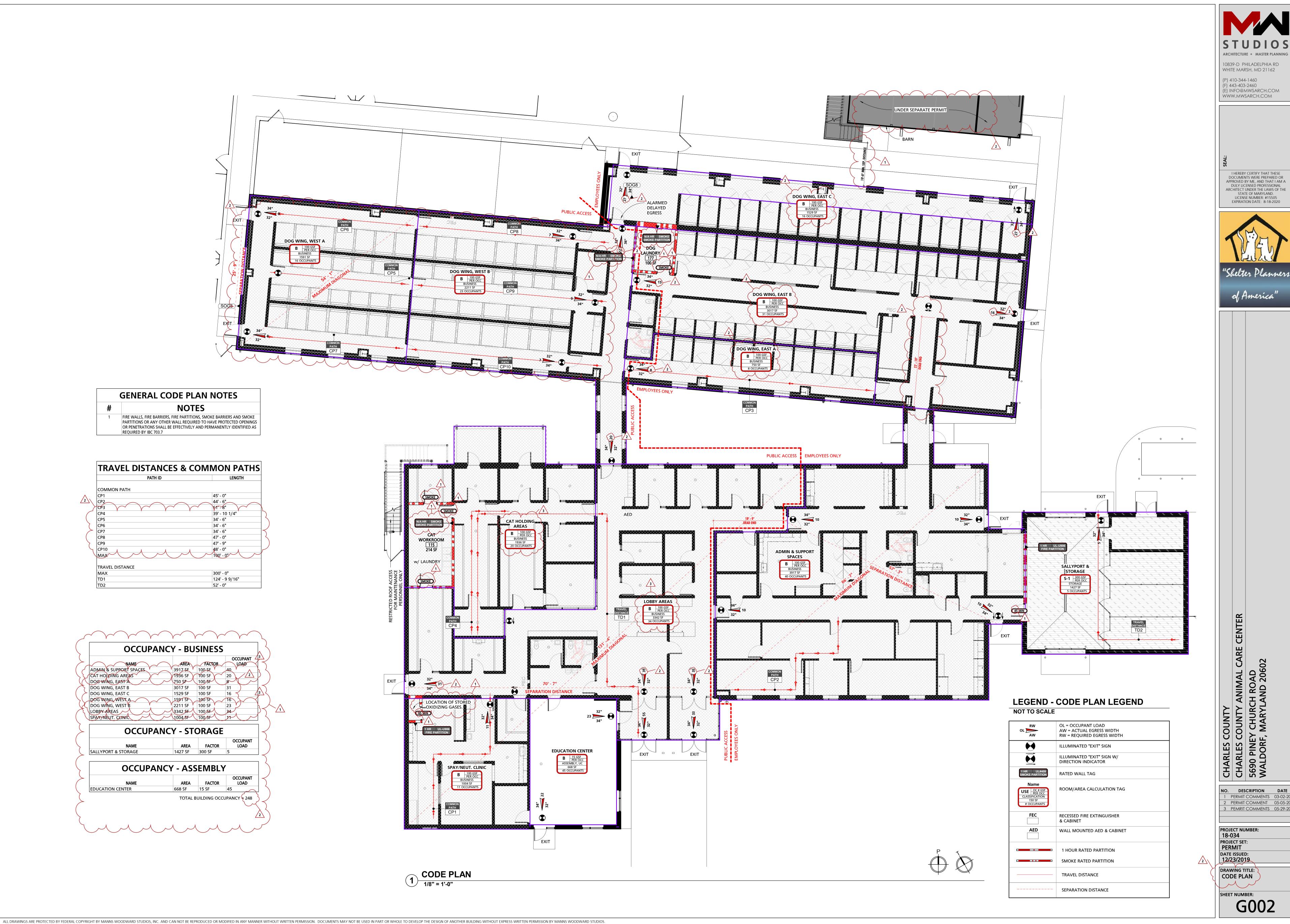






PROJECT NUMBER: PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE: CODE ANALYSIS



10839-D PHILADELPHIA RD WHITE MARSH, MD 21162 (P) 410-344-1460 (F) 443-403-2460

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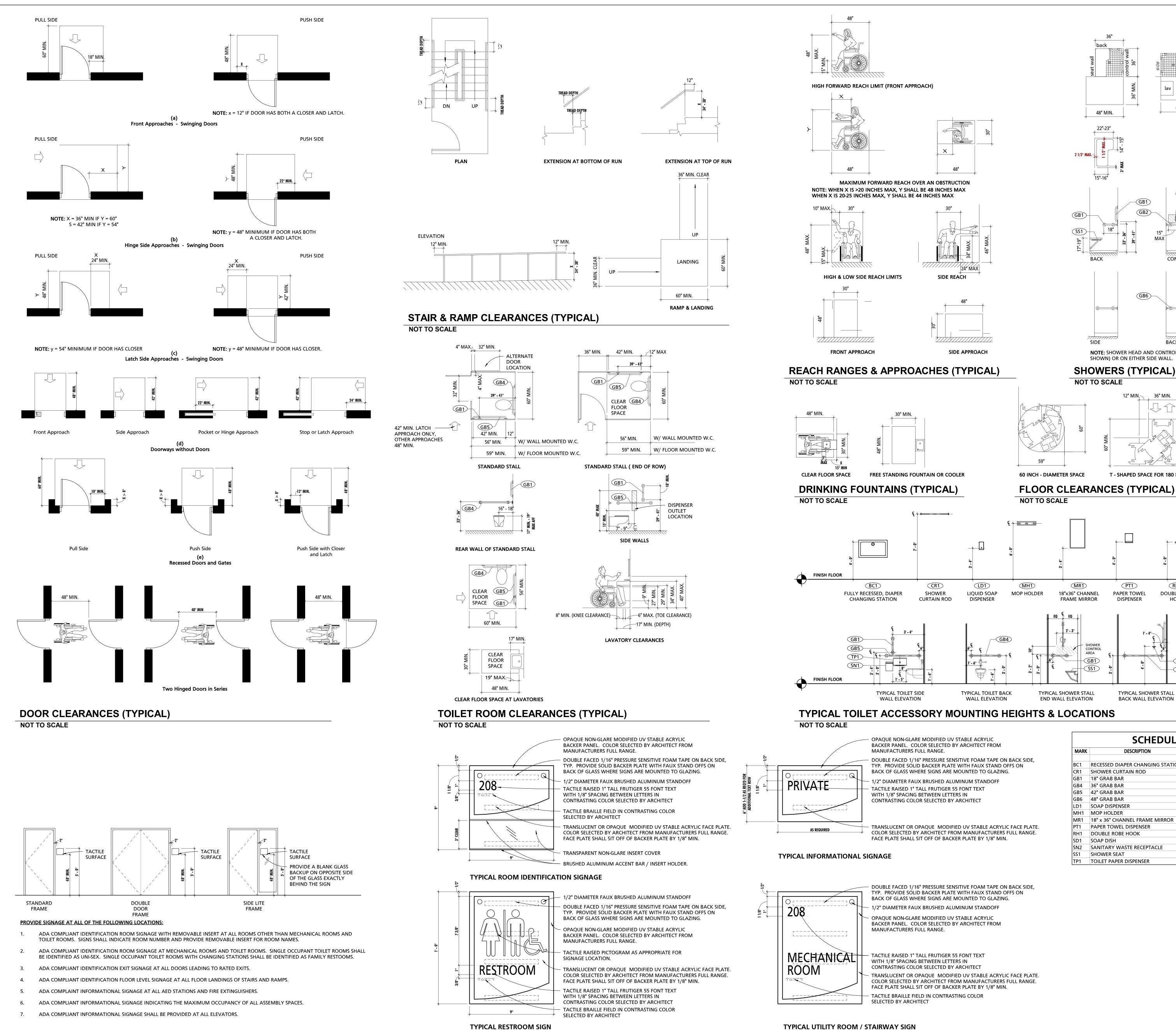


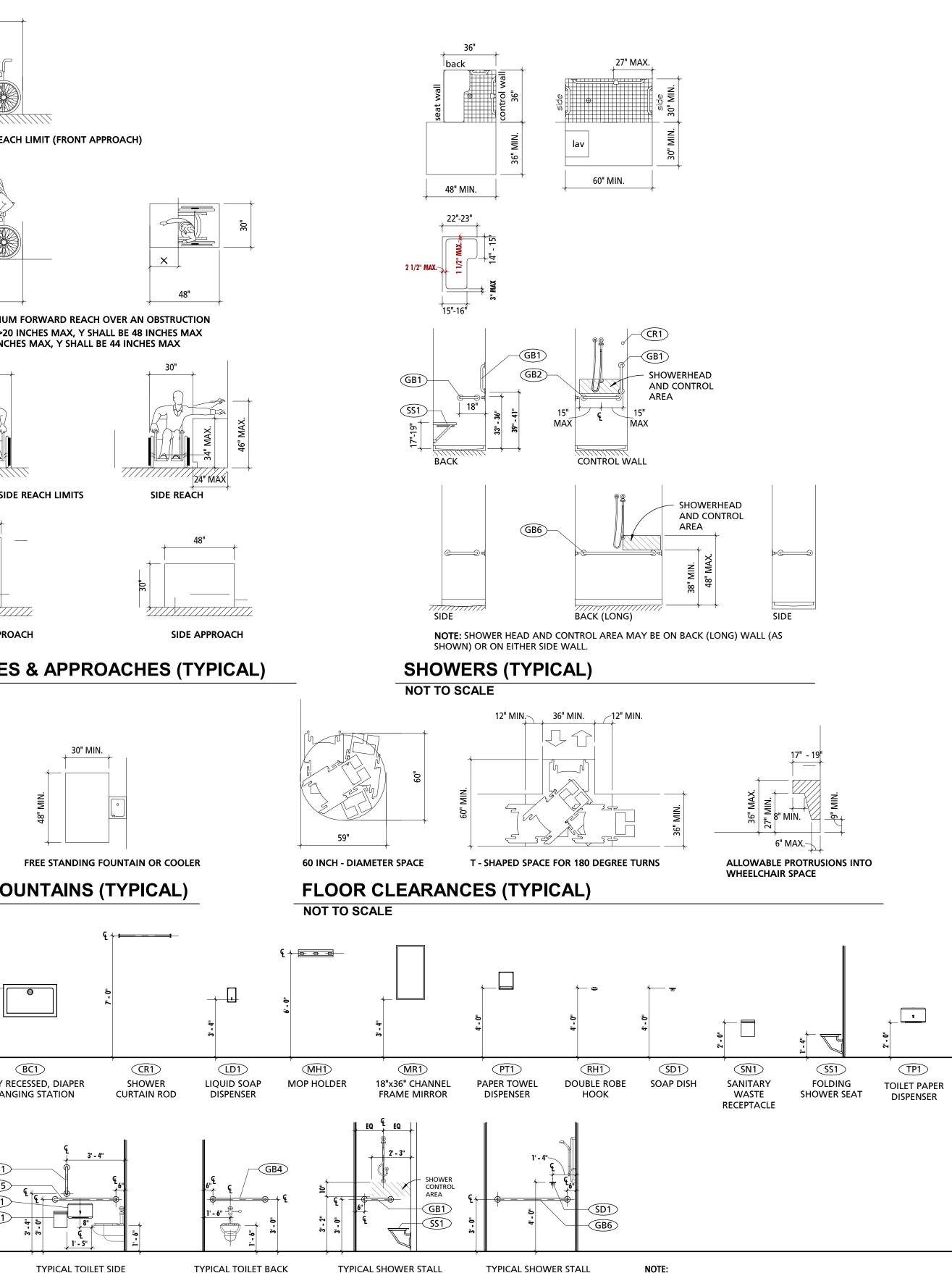
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1 PERMIT COMMENTS 03-02-20 2 PERMIT COMMENT 05-05-20 3 PEMRIT COMMENTS 05-29-20 PROJECT NUMBER:

PROJECT SET: PERMIT DATE ISSUED:

12/23/2019 DRAWING TITLE: CODE PLAN





SCHEDULE - TOILET ROOM ACCESSORIES BOD MANUFACTURER BOD MODEL RECESSED DIAPER CHANGING STATION KOALA KB100-01ST GREY CR1 SHOWER CURTAIN ROD BOBRICK B-207 BOBRICK B-5806 BOBRICK B-5806 BOBRICK B-5806 BOBRICK B-5806 TORK 571608 BOBRICK B-223 BOBRICK B-165 MR1 18" x 36" CHANNEL FRAME MIRROR PAPER TOWEL DISPENSER 5511282 DOUBLE ROBE HOOK AMERICAN SPECIALTIES 7345 AMERICAN SPECIALTIES 7320 SANITARY WASTE RECEPTACLE BOBRICK B-270 **BOBRICK** B-5192

5555290

TORK

MOUNTING HEIGHTS & LOCATIONS APPLY TO BASIS OF DESIGN EQUIPMENT. IF FINAL SELECTED EQUIPMENT DOES NOT MATCH THE BASIS OF DESIGN, G.C. SHALL

COORDINATE FINAL LOCATION OF EQUIPMENT W/ ARCHITECT PRIOR TO INSTALLATION

ARCHITECTURE + MASTER PLANNING

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EXPIRATION DATE: 8-18-2020

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NO. DESCRIPTION DATE

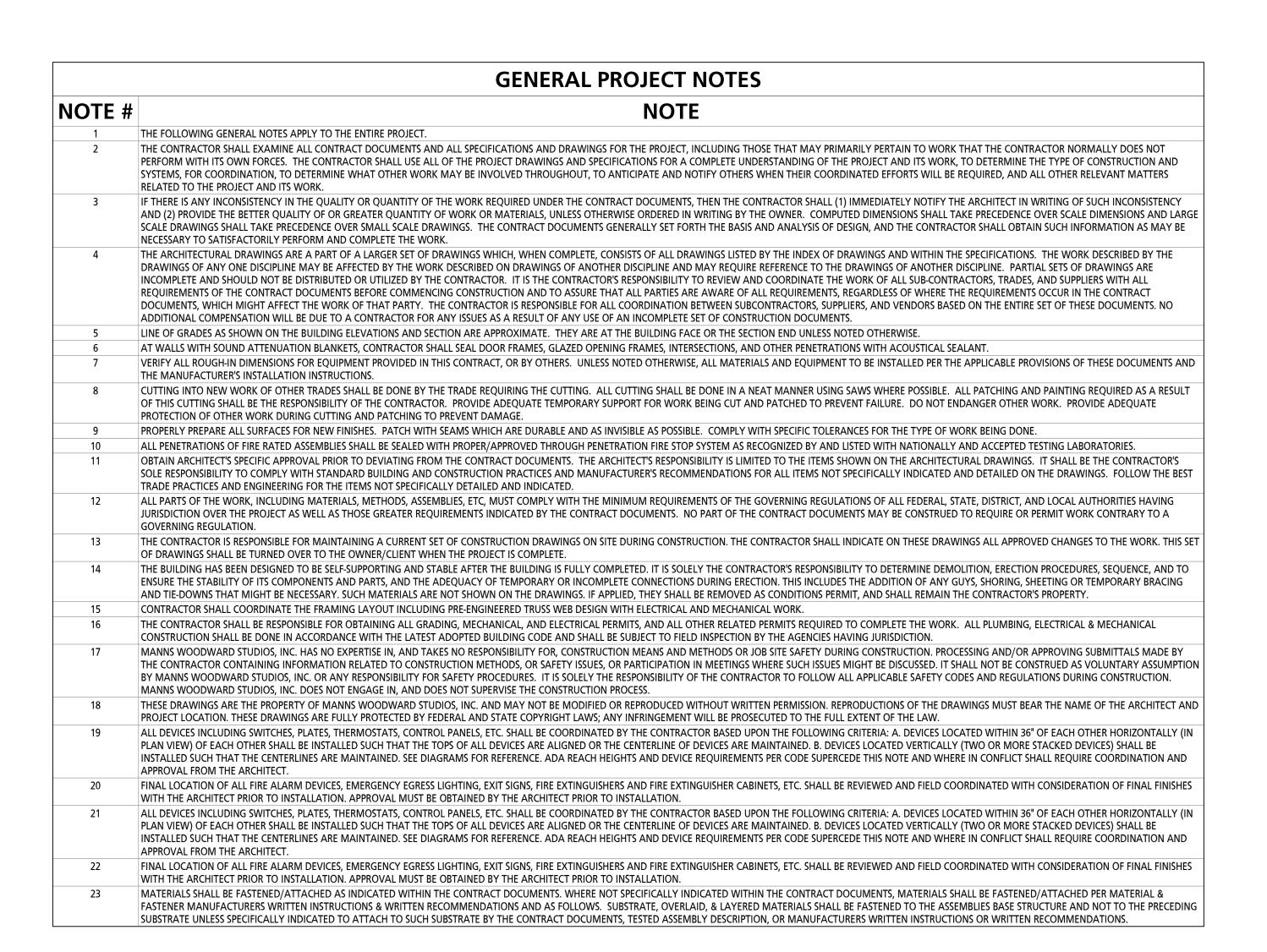
PROJECT NUMBER: PROJECT SET: PERMIT

DATE ISSUED: 12/23/2019

DRAWING TITLE: TYPICAL ACCESSIBILITY **GUIDELINES & ADA** SIGNAGE DETAILS SHEET NUMBER:

TYPICAL SIGNAGE DETAILS

ADA SIGNAGE MOUNTING LOCATIONS



GENERAL DOG WING NOTES

THE CONTRACTOR SHALL BE RESPONSIBLE FOR DEVELOPING A METAL BUILDING PACKAGE THAT MEETS THE DESIGN INTENT INDICATED IN THE CONTRACT DOCUMENTS, INCLUDING CONFIGURATION, DIMENSIONS, MATERIALS, AND MAJOR DESIGN FEATURES. THE CONTRACTOR IS RESPONSIBLE FOR ALL FABRICATION AND ERECTION DETAILS. DESIGN, COMPONENTS, AND ANY ASSOCIATED CONNECTIONS SHALL BE COMPLETED BY A MD REGISTERED STRUCTURAL ENGINEER HIRED BY THE CONTRACTOR. THIS SHALL INCLUDE, BUT NOT LIMITED TO, THE STRUCTURE, STRUCTURE ENVELOPE, AND FINISHES. THE DESIGN SHALL SATISFY THE LOAD REQUIREMENTS SPECIFIED IN THE CONSTRUCTION DOCUMENTS AND PER ALL APPLICABLE CODES. CALCULATIONS ARE REQUIRED TO BE SEALED BY A MD REGISTERED STRUCTURAL ENGINEER. ALL REQUIRED BUILDING AND TRADE PERMITS FOR THIS DELEGATED DESIGN IS THE RESPONSIBILITY OF THE CONTRACTOR.

THE PRE-FABRICATED METAL BUILDING HAS BEEN DESIGN BY AMERICAN BUILDINGS COMPANY, A NUCOR COMPANY. AMERICAN BUILDINGS COMPANY, A NUCOR COMPANY HAS COORDINATED ALL SYSTEM COMPONENTS INCLUDING CONFIGURATION, DIMENSIONS, MATERIALS, MAJOR DESIGN FEATURES, AND COORDINATION/REQUIREMENTS OF THE FOUNDATIONS AND SLABS. IF AN ALTERNATIVE VENDER AND COMPONENTS ARE ENGAGED, THE VENDER, ALL COMPONENTS, AND FUNCTIONALITY SHALL BE APPROVED BY THE OWNER. WHERE ALTERNATE VENDER AND COMPONENTS ARE ACCEPTED BY THE OWNER, THE GC AND ALTERNATED VENDOR SHALL BE RESPONSIBLE TO COMPLETE AND PAY FOR ANY COORDINATION, REDESIGN, RE-ENGINEERING, ALTERNATIONS, OR OTHER SUCH WORK AND/OR MATERIALS REQUIRED TO ACCOMMODATE SUCH ALTERNATE SYSTEM AND COMPONENTS.

UL-U906

NOT TO SCALE

Design No. U906

BXUV - Fire Resistance Ratings - ANSI/UL 263

BXUV7 - Fire Resistance Ratings - CAN/ULC-S101 Certified for Canada

Design No. U906

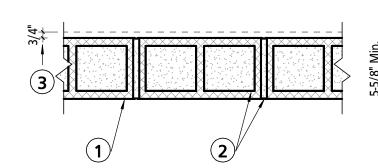
May 26, 2015

Bearing Wall Rating — 2 HR.

Nonbearing Wall Rating — 2 HR.

This design was evaluated using a load design method other than the Limit States Design Method (e.g., Working Stress Design Method). For jurisdictions employing the Limit States Design Method, such as Canada, a load restriction factor shall be used — See Guide BXUV or BXUV7

* Indicates such products shall bear the UL or cUL Certification Mark for jurisdictions employing the UL or cUL Certification (such as Canada), respectively.



1. Concrete Blocks* — Nominal 6 by 8 by 16 in, hollow or solid. Various designs. Classification (2 br)

See Concrete Blocks category for list of eligible manufacturers.

ANCHOR CONCRETE PRODUCTS INC

GAGNE & SON CONCRETE BLOCK INC
GLENWOOD MASONRY PRODUCTS

"Thermasheath-3", "Durasheath-3"

Allowable compressive stress of 57% of max allowable compressive stress in accordance with the empirical design method.

OLDCASTLE APG SOUTH INC, DBA ADAMS PRODUCTS

WESTBROOK CONCRETE BLOCK CO INC

Allowable compressive stress of 75.6% of max allowable compressive stress in accordance with the empirical design method.

2. **Mortar** — Blocks laid in full bed of mortar, nom. 3/8 in. thick, of not less than 2-1/4 and not more than 3-1/2 parts of clean sharp sand to 1 part Portland cement (proportioned by volume) and not more than 50 percent hydrated lime (by cement volume). Vertical joints staggered.

3. **Portland Cement Stucco or Gypsum Plaster** — Add 1/2 hr to Classification if used. Attached to concrete blocks (Item 1).

4. **Foamed Plastic*** - (Optional-Not Shown) - 1-1/2 in. thick max, 4 ft wide sheathing attached to concrete blocks (Item 1).

ATLAS ROOFING CORP — "EnergyShield Pro Wall Insulation" and "EnergyShield Pro 2 Wall

Insulation"

CARLISLE COATINGS & WATERPROOFING INC — Type R2+ Sheath

HUNTER PANELS — Types Xci-Class A, Xci 286

RMAX OPERATING L L C — "TSX-8500", "TSX-8510", "Thermasheath-XP", "ECOMAXci",

THE DOW CHEMICAL CO — Types Thermax Sheathing, Thermax Light Duty Insulation, Thermax Heavy Duty Insulation, Thermax Metal Building Board, Thermax White Finish Insulation, Thermax ci Exterior Insulation, Thermax XARMOR ci Exterior Insulation, Thermax IH Insulation, Thermax Plus Liner Panel, Thermax Heavy Duty Plus (HDP) and TUFF-R™ ci Insulation

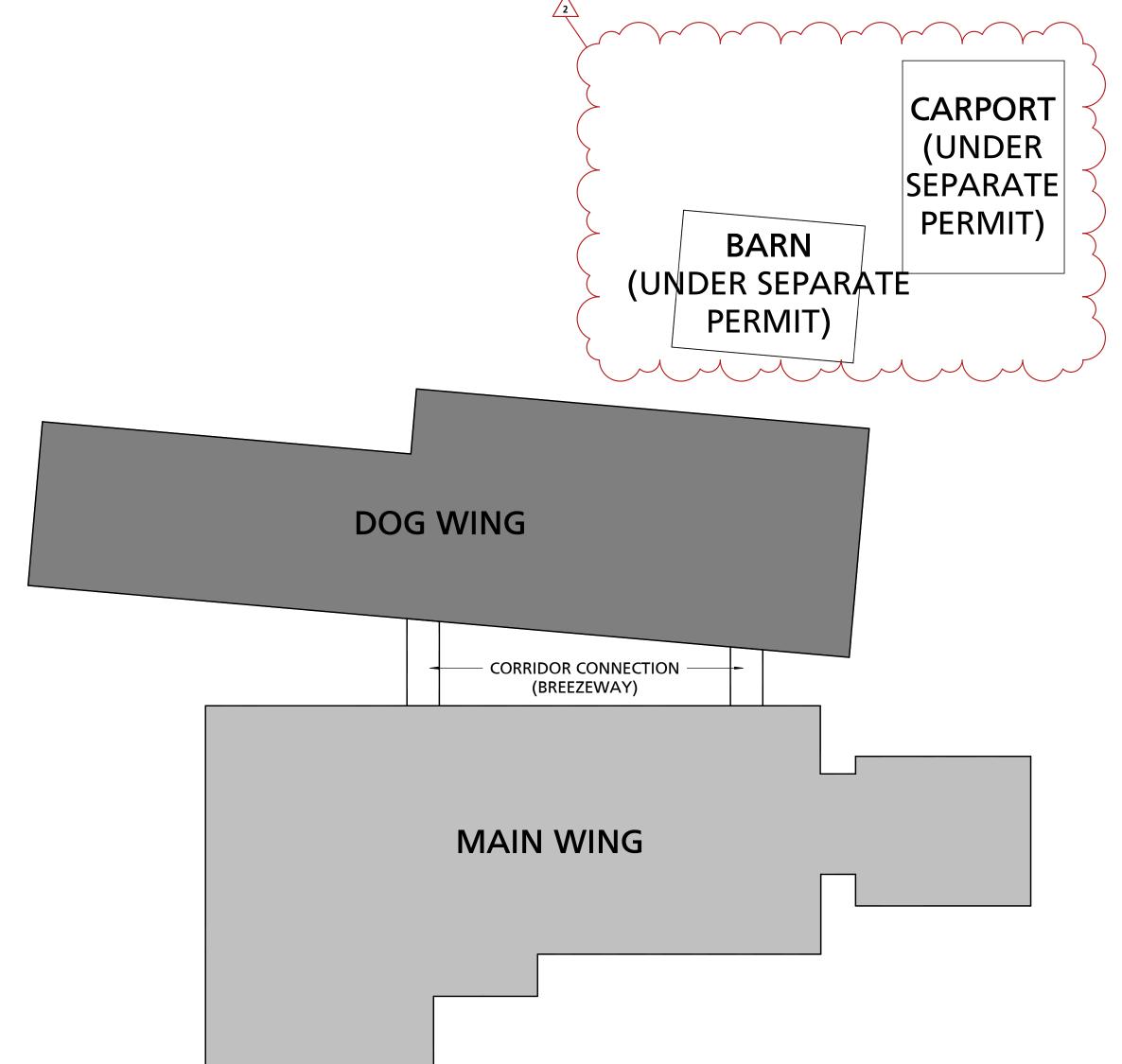
4A. **Building Units** — As an alternate to Item 5, min. 1-in thick polyisocyanurate composite foamed plastic insulation boards, nom. 48 by 48 or 96 in., with a facer on one side and wood fiber board on the other

on the other.

RMAX OPERATING L L C — "Thermasheath-SI"

* Indicates such products shall bear the UL or cUL Certification Mark for jurisdictions employing the UL or cUL Certification (such as Canada), respectively.

PAVILION (UNDER SEPARATE PERMIT)



KEY PLAN

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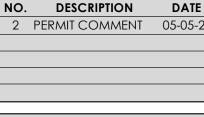
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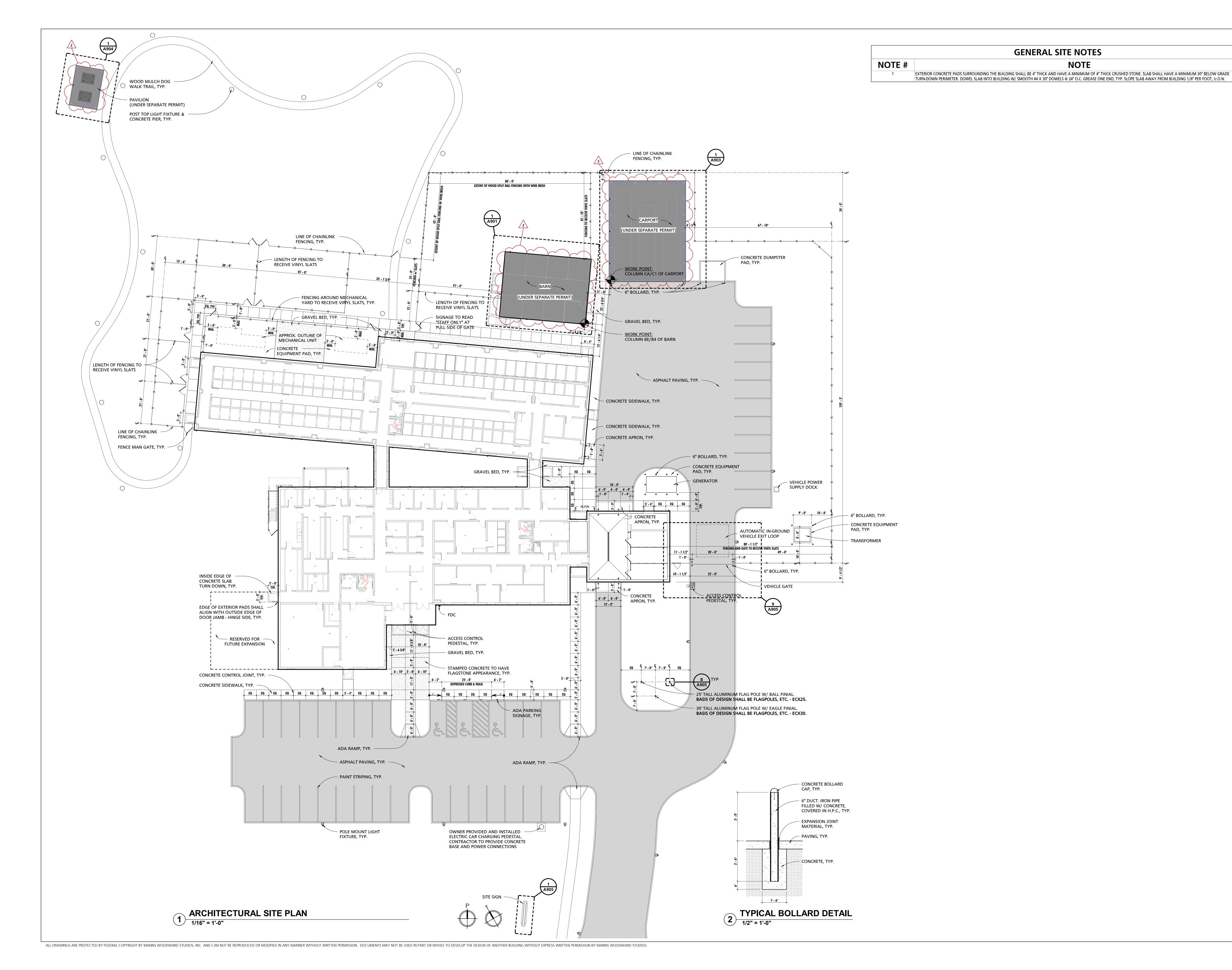
HARLES COUNTY
HARLES COUNTY ANIMAL CARE CENTI
590 PINEY CHURCH ROAD
7ALDORF, MARYLAND 20602



PROJECT NUMBER:
18-034
PROJECT SET:
PERMIT
DATE ISSUED:
12/23/2019

DRAWING TITLE:
GENERAL PROJECT
NOTES & UL ASSEMBLIES
SHEET NUMBER:

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STATE OF MARYLAND.
LICENSE NUMBER: #15505
EXPIRATION DATE: 8-18-2020



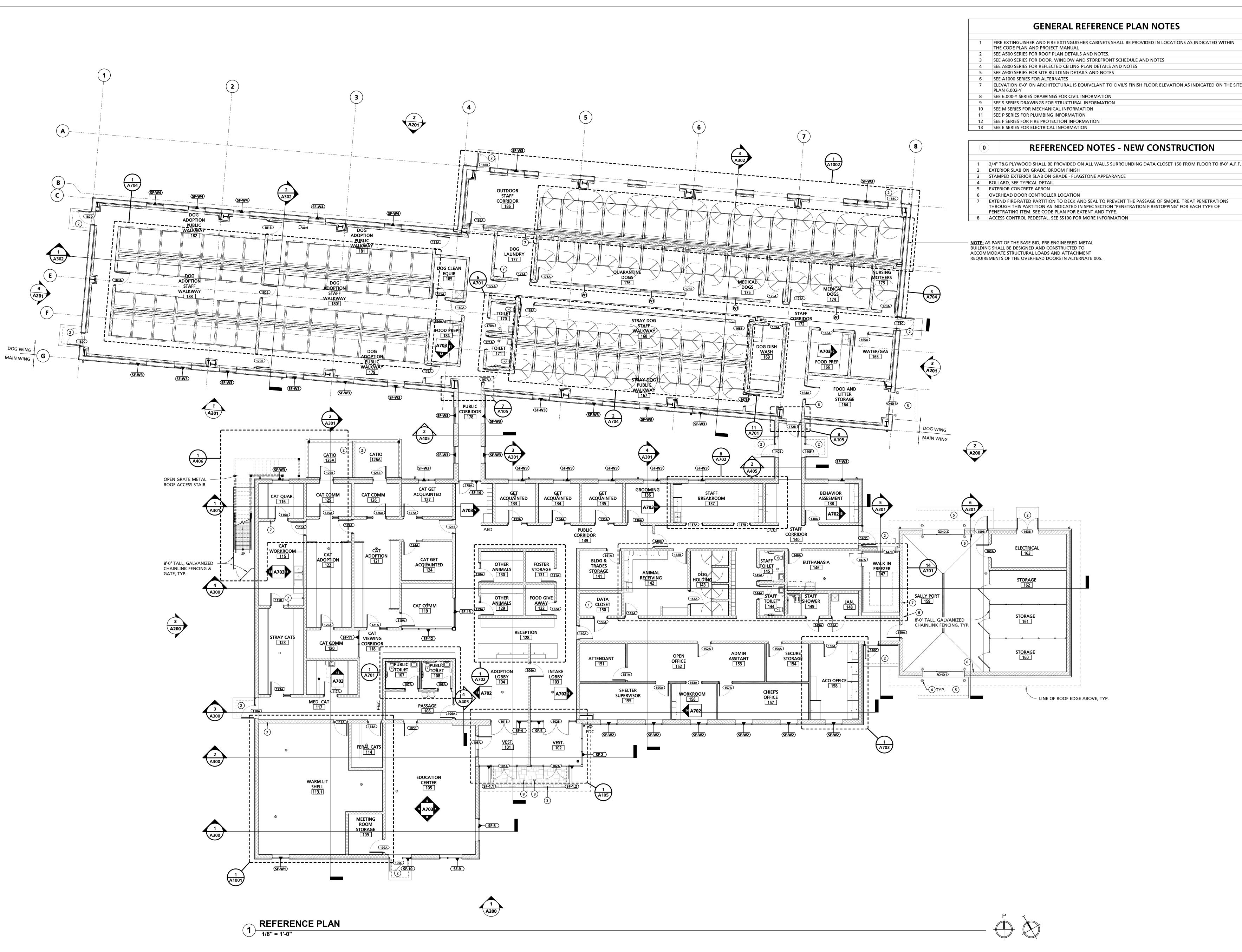
shelter Planner

CHARLES COUNTY ANIMAL CARE CENTER 5690 PINEY CHURCH ROAD WALDORF, MARYLAND 20602

NO. DESCRIPTION DATE
2 PERMIT COMMENT 05-05-20

PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE:
ARCHITECTURAL SITE



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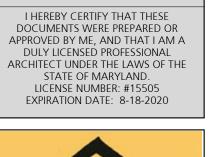


FIRE EXTINGUISHER AND FIRE EXTINGUISHER CABINETS SHALL BE PROVIDED IN LOCATIONS AS INDICATED WITHIN

- EXTEND FIRE-RATED PARTITION TO DECK AND SEAL TO PREVENT THE PASSAGE OF SMOKE. TREAT PENETRATIONS



ARCHITECTURE + MASTER PLANNING

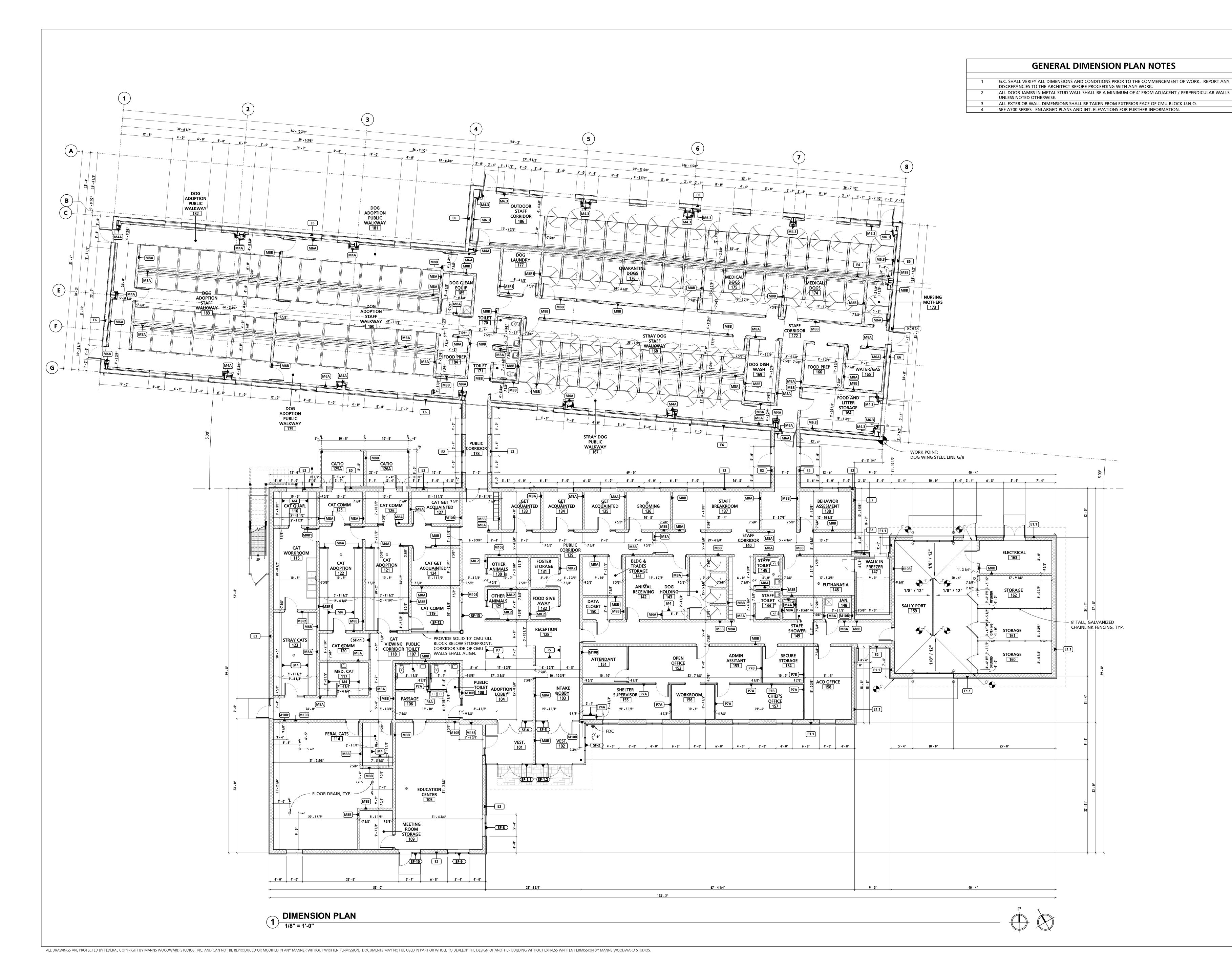




NO. DESCRIPTION

PROJECT NUMBER: PROJECT SET: DATE ISSUED: 12/23/2019

DRAWING TITLE: REFERENCE PLAN





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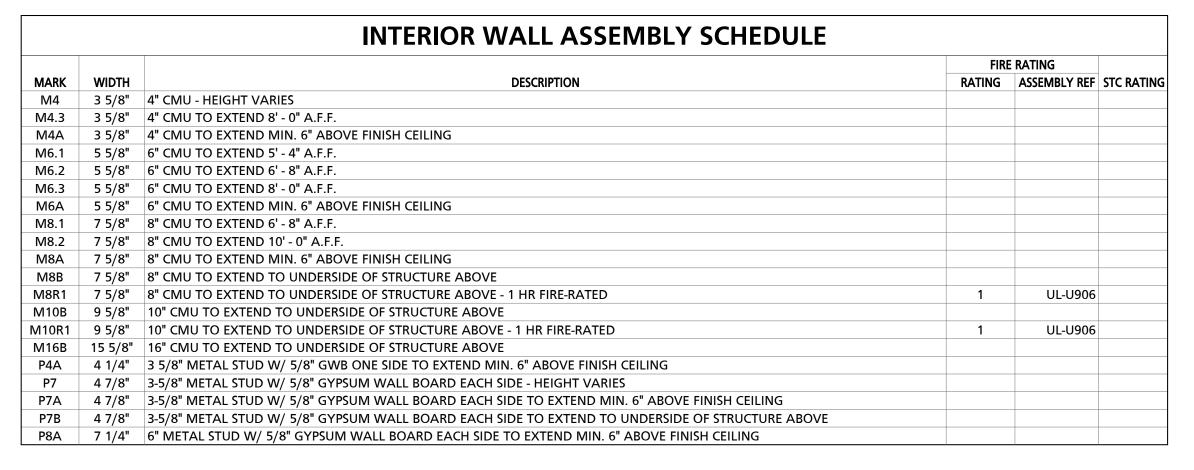
I HEREBY CERTIFY THAT THESE DOCUMENTS WERE PREPARED OR APPROVED BY ME, AND THAT I AM A DULY LICENSED PROFESSIONAL ARCHITECT UNDER THE LAWS OF THE STATE OF MARYLAND. LICENSE NUMBER: #15505 EXPIRATION DATE: 8-18-2020

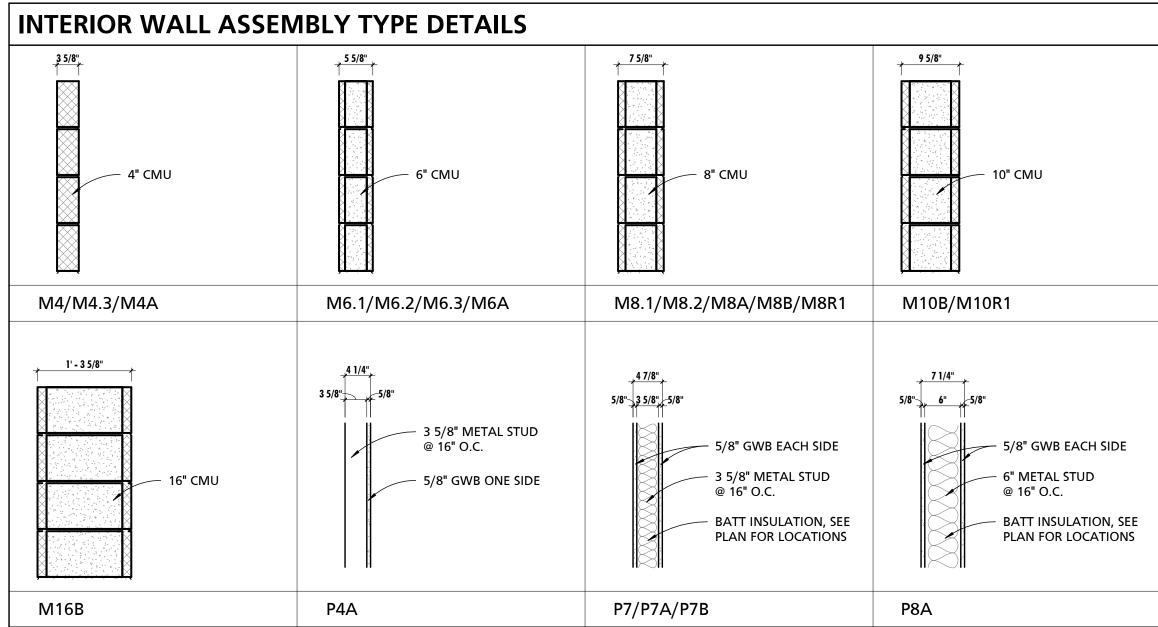


NO. DESCRIPTION DATE

PROJECT NUMBER: PROJECT SET: DATE ISSUED: 12/23/2019

DRAWING TITLE: **DIMENSION PLAN**





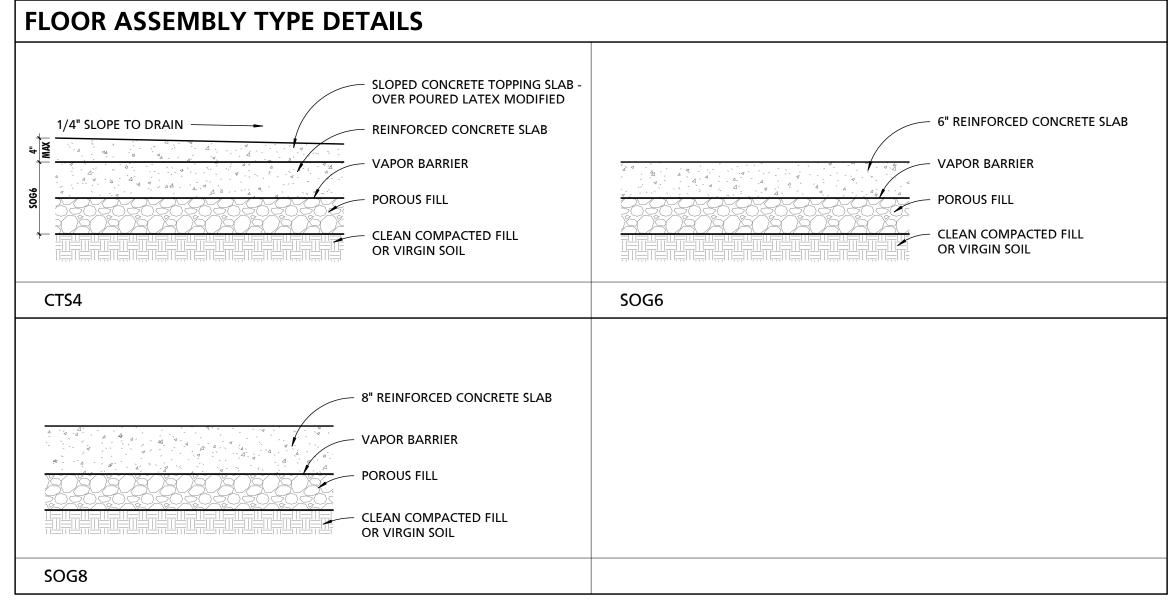
INTERIOR NON-LOAD BEARING / NON-STRUCTURAL PARTITION METAL STUD FRAMING SCHEDULE

HEIGHT	SHAPE	GAUGE	SPACING
0' - 13'	3-5/8"x1-1/4"	20	16" o/c
0' - 18'	3-5/8"x1-5/8"	18	16" o/c
0' - 19'	6"x1-1/4"	25	16" o/c
0' - 21'	8"x2" [′]	18	16" o/c

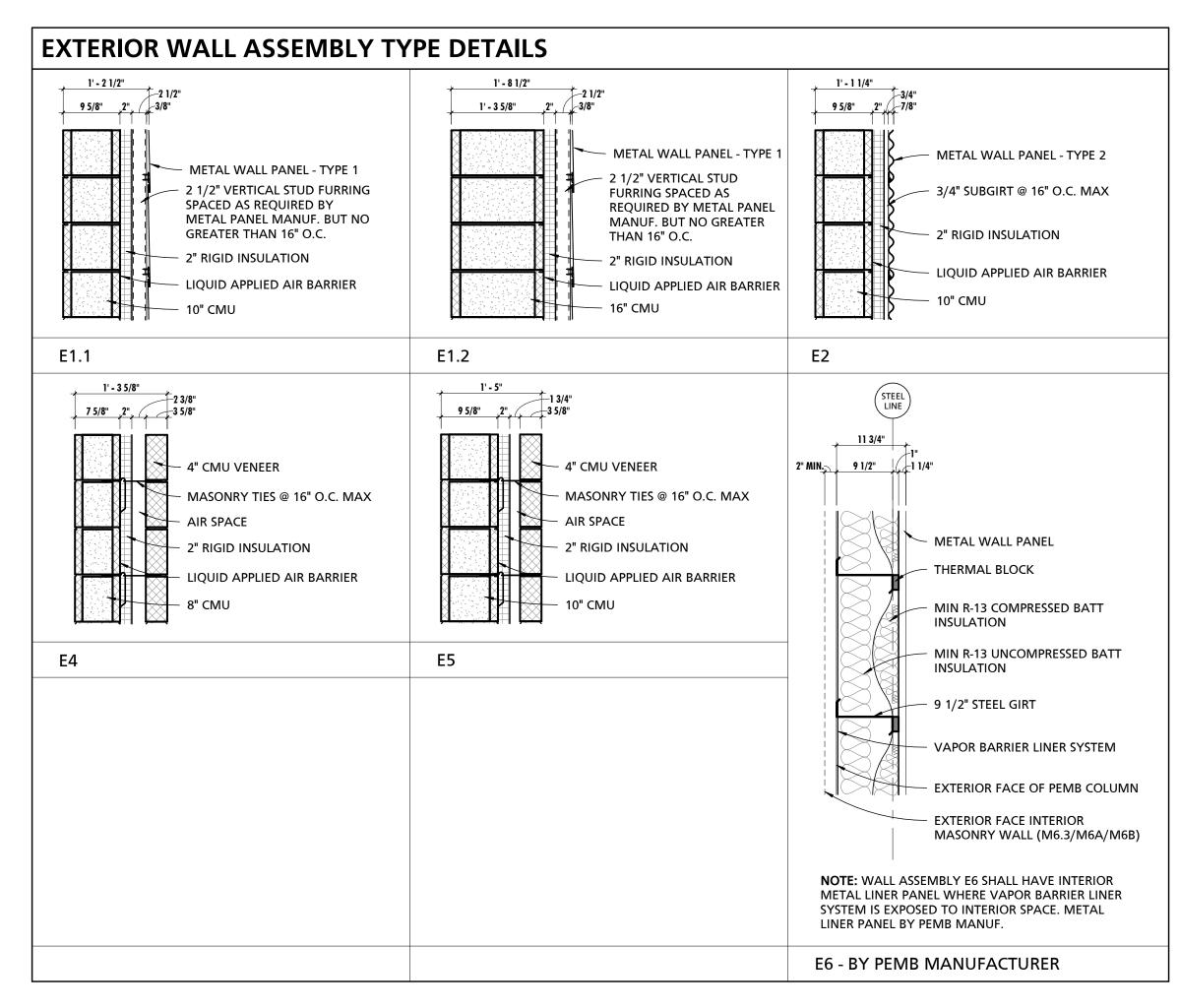
NOTE: WHERE STUDS ARE PLACED AGAINST MASONRY OR CONCRETE WALLS FOR THE PURPOSES OF FURRING, HIGHER SPANS THAN INDICATED WITHIN THIS SCHEDULE ARE PERMITTED PROVIDED THAT TIE BACK BRACING IS PROVIDED AT 10'-0" O.C. MAX. SEE STRUCTURAL DRAWINGS FOR LOAD BEARING AND STRUCTURAL LIGHT GAUGE METAL STUDS.

GENERAL INTERIOR WALL NOTES ENTRY SPACES, LOBBIES, AND CORRIDORS TO RECEIVE IMPACT RESISTANT GYPSUM WALL BOARD, U.N.O. PROVIDE FIBERGLASS REINFORCED MOISTURE RESISTANT GYPSUM WALL BOARD IN ALL EQUIPMENT ROOMS, JANITOR'S CLOSETS, RESTROOMS, KITCHENS AND OTHER WET AREAS. PROVIDE FIBERGLASS REINFORCED MOISTURE RESISTANT WALL BOARD IN ALL OTHER AREAS WITHIN 8'-0" OF WATER SOURCE. CONTRACTOR SHALL PROVIDE BLOCKING AND NAILERS AS REQUIRED TO SUPPORT ALL NEW WORK, INCLUDING ITEMS TO BE PROVIDED AND/OR INSTALLED BY OWNER. ALL CORRIDOR AND FIRE-RATED PARTITIONS SHALL BE EXTENDED TO THE UNDERSIDE OF THE STRUCTURE ABOVE, U.N.O. THE PERIMETER WALLS OF ANY SPACE NOT PROVIDED WITH A CEILING SHALL EXTEND THE THE UNDERSIDE OF DECK ABOVE. PROVIDE DEFLECTION TRACKS AT TOP OF ALL NON-LOAD BEARING STUD WALLS EXTENDING TO THE UNDERSIDE OF STRUCTURE ABOVE, U.N.O. PROVIDE CONCRETE BACKER BOARD IN LIEU OF GYPSUM WALL BOARD WHERE TILE FINISH IS INDICATED. ALL FIRE WALLS SHALL BE PLACARDED OR STENCILED ON BOTH SIDES WITH THE PHRASE "FIRE WALL" PER IBC SECTION 703.7.1. THE LETTERS SHALL BE RED IN COLOR, 6" INCHES HIGH AND A MIN. OF 3/4" WIDE. THE PHRASE SHALL BE WRITTEN ONCE FOR EACH 15 FEET OF HORIZONTAL WALL LENGTH. THIS SIGNAGE MAY BE LOCATED IN THE CONCEALED SPACE ABOVE A CEILING. SEE METAL STUD PARTITION FRAMING SCHEDULE FOR INTERIOR PARTITION REQUIREMENTS MOISTURE RESISTANT GYPSUM WALL BOARD SHALL BE UTILIZED IN ALL AREAS WHERE GYPSUM WALL BOARD IS TO BE DIRECTLY ADHERED TO CONCRETE OR MASONRY SURFACES IN INTERIOR APPLICATIONS. SUBSTRATE SHALL BE CLEANED AS REQUIRED AND FREE OF DUST, DEBRIS, AND MOISTURE PRIOR TO ADHESION AND FINISHING. CONSTRUCTION OF RATED WALL ASSEMBLIES SHALL BE STRICTLY ADHERED TO IN ACCORDANCE WITH UL AND/OR GYPSUM ASSEMBLY SPECIFICATIONS. REFER TO CODE PLANS FOR ADDITIONAL INFORMATION. PROVIDE A BULLNOSE CMU AT ALL OUTSIDE CORNERS OF INTERIOR MASONRY WALLS & SILLS

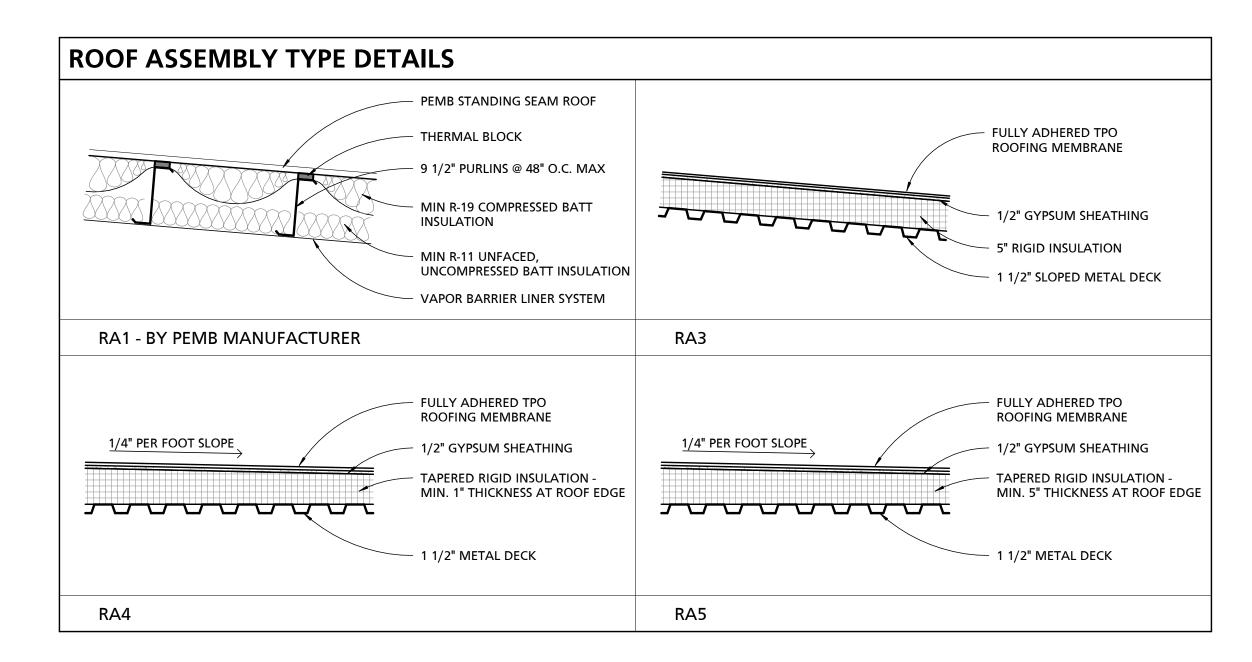
FLOOR ASSEMBLY SCHEDULE							
MARK	DESCRIPTION	COMMENTS					
CTS4	4" CONCRETE SLAB						
SOG6	6" CONCRETE SLAB OVER VAPOR BARRIER AND POROUS FILL						
SOG8	8" CONCRETE SLAB OVER VAPOR BARRIER AND POROUS FILL	TYPICAL DOG WING SLAB					
FLO	OOR ASSEMBLY TYPE DETAILS						
	SLOPED CONCRETE TOPPING SLAB -						



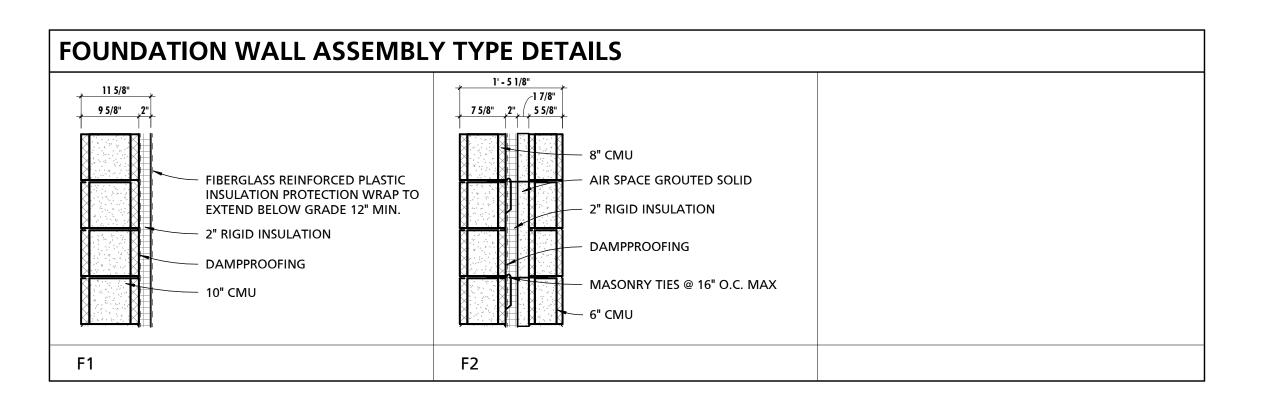
EXTERIOR WALL ASSEMBLY SCHEDULE MARK WIDTH E1.1 14 1/2" 10" CMU W/ LIQUID APPLIED AIR BARRIER, 2" RIGID INSULATION, 2 1/2" STUD FURRING AND METAL WALL PANEL - TYPE 1 E1.2 20 1/2" 16" CMU W/ LIQUID APPLIED AIR BARRIER W/ 2" RIGID INSULATION, 2 1/2" STUD FURRING AND METAL WALL PANEL - TYPE 1 E2 13 1/4" 10" CMU W/ LIQUID APPLIED AIR BARRIER, 2" RIGID INSULATION, 3/4" SUBGIRTS AND METAL WALL PANEL - TYPE 2 E4 15 5/8" 8" CMU, 2" RIGID INSULATION, AIR SPACE AND 4" CMU VENEER E5 17" 10" CMU, 2" RIGID INSULATION, AIR SPACE AND 4" CMU VENEER E6 11 3/4" VAPOR BARRIER LINER SYSTEM OVER 9 1/2" GIRTS W/ THERMAL BLOCKING, (2) LAYERS MIN R-13 BATT INSULATION AND PEMB WALL PANEL



	ROOF ASSEMBLY SCHEDULE						
MARK	DESCRIPTION						
RA1	PEMB STANDING SEAM ROOF OVER 9 1/2" PURLINS W/ THERMAL BLOCKING, (1) LAYER MIN R-19 BATT INSULATION, (1) LAYER MIN R-11 BATT INSULATION AND A VAPOR BARRIER LINER SYSTEM						
RA3	FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, 5" RIGID INSULATION AND SLOPED 1 1/2" METAL DECK						
RA4	FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, MIN 1" TAPERED RIGID INSULATION AND 1 1/2" METAL DECK						
RA5	FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, MIN 5" TAPERED RIGID INSULATION AND 1 1/2" METAL DECK						



	FOUNDATION WALL ASSEMBLY SCHEDULE						
MARK	WIDTH	DESCRIPTION					
F1	11 5/8"	10" CMU W/ DAMPPROOFING, 2" RIGID INSULATION AND FIBERGLASS REINFORCED PLASTIC INSULATION PROTECTION WRAP					
F2	17 1/8"	6" CMU W/ DAMPPROOFING, 2" RIGID INSULATION, 1 7/8" AIR SPACE AND 8" CMU					





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LICENSE NUMBER: #15505
EXPIRATION DATE: 8-18-2020



"Shelter Planne of America"

CHARLES COUNTY ANIMAL CARE CENTE 5690 PINEY CHURCH ROAD WALDORF, MARYLAND 20602

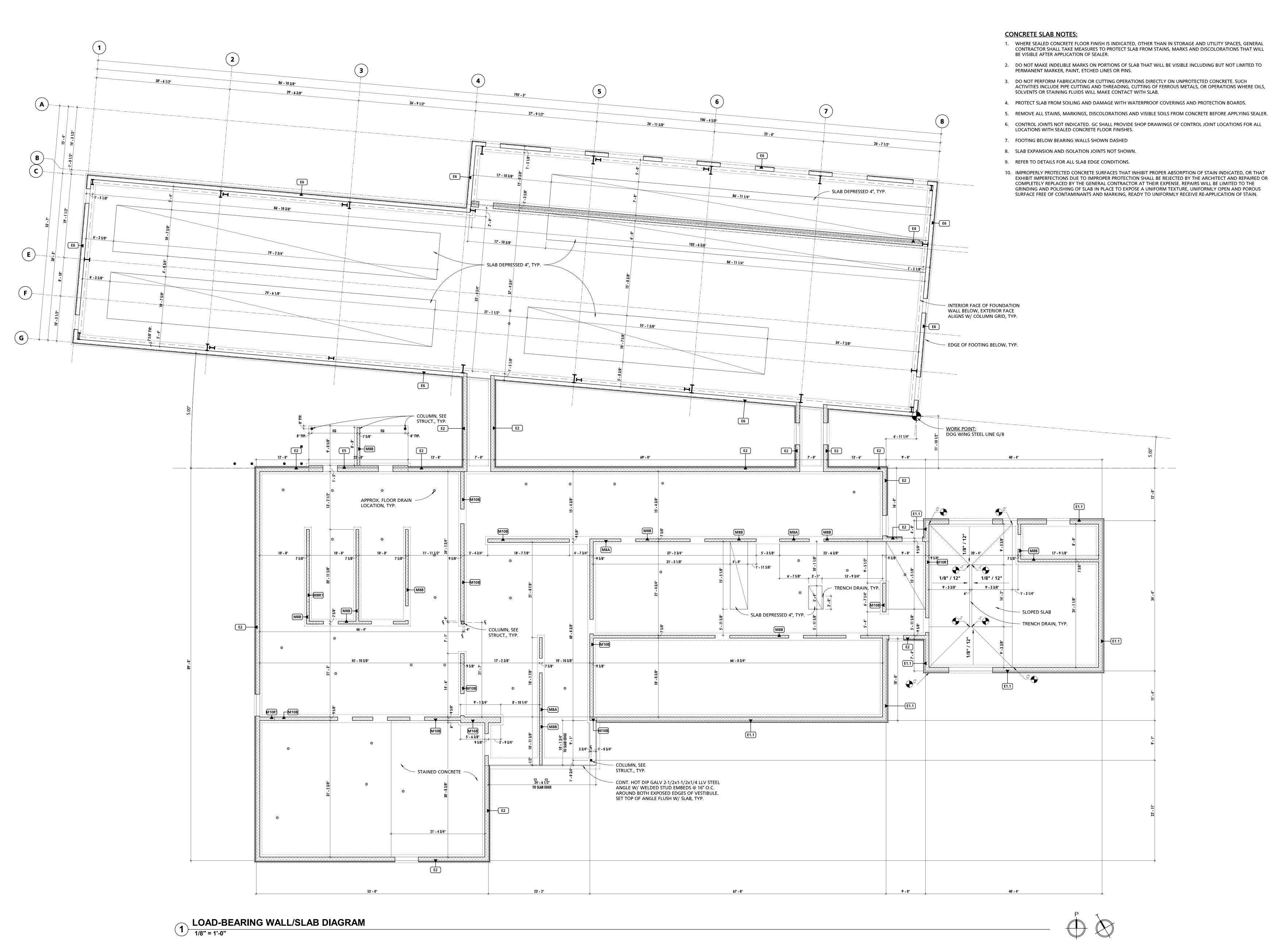
PROJECT NUMBER: 18-034
PROJECT SET: PERMIT
DATE ISSUED:

12/23/2019

SHEET NUMBER:

DRAWING TITLE:
BUILDING ASSEMBLY
TYPES & DETAILS

NO. DESCRIPTION DATE



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- 1. WHERE SEALED CONCRETE FLOOR FINISH IS INDICATED, OTHER THAN IN STORAGE AND UTILITY SPACES, GENERAL CONTRACTOR SHALL TAKE MEASURES TO PROTECT SLAB FROM STAINS, MARKS AND DISCOLORATIONS THAT WILL
- 3. DO NOT PERFORM FABRICATION OR CUTTING OPERATIONS DIRECTLY ON UNPROTECTED CONCRETE. SUCH ACTIVITIES INCLUDE PIPE CUTTING AND THREADING, CUTTING OF FERROUS METALS, OR OPERATIONS WHERE OILS,
- 4. PROTECT SLAB FROM SOILING AND DAMAGE WITH WATERPROOF COVERINGS AND PROTECTION BOARDS.

- 10. IMPROPERLY PROTECTED CONCRETE SURFACES THAT INHIBIT PROPER ABSORPTION OF STAIN INDICATED, OR THAT EXHIBIT IMPERFECTIONS DUE TO IMPROPER PROTECTION SHALL BE REJECTED BY THE ARCHITECT AND REPAIRED OR COMPLETELY REPLACED BY THE GENERAL CONTRACTOR AT THEIR EXPENSE. REPAIRS WILL BE LIMITED TO THE GRINDING AND POLISHING OF SLAB IN PLACE TO EXPOSE A UNIFORM TEXTURE, UNIFORMLY OPEN AND POROUS SURFACE FREE OF CONTAMINANTS AND MARKING, READY TO UNIFORMLY RECEIVE RE-APPLICATION OF STAIN.

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10839-D PHILADELPHIA RD

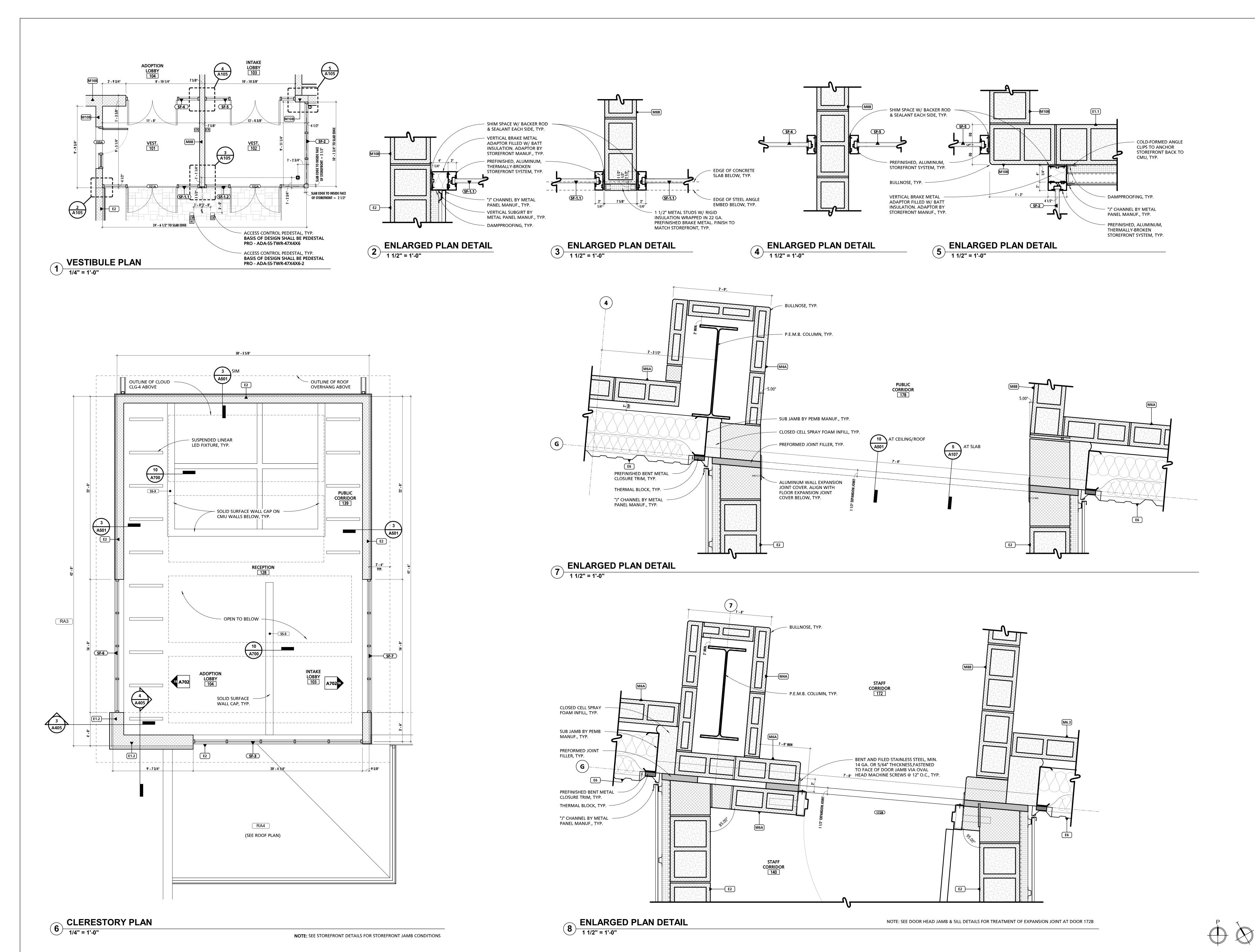
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NO. DESCRIPTION DATE

PROJECT SET: PERMIT DATE ISSUED:

12/23/2019 DRAWING TITLE: SLAB/BEARING DIAGRAM



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PROJECT NUMBER: PROJECT SET: DATE ISSUED:

12/23/2019 DRAWING TITLE: PLAN DETAILS



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EXPIRATION DATE: 8-18-2020



NO. DESCRIPTION DATE

PROJECT NUMBER: PROJECT SET: DATE ISSUED: 12/23/2019

DRAWING TITLE: FINISH PLAN

	SCHEDULE - FINISHES ROOM INFORMATION WALL FINISH									
RM #	ROOM INFORMATION ROOM NAME	FLOOR FINISH	BASE	NORTH	SOUTH	EAST	WEST	CEILING FINISH REMARKS		
01	VEST.	WOM	B-1	EPX-1/EPX-4	N/A	EPX-3	EPX-1	CLG-1		
02 03	VEST. INTAKE LOBBY	WOM	B-1 N/A	EPX-1	N/A EPX-1	N/A EPX-1	EPX-3 EPX-3	CLG-1 CLG-4/RA1		
04	ADOPTION LOBBY		N/A	EPX-1	EPX-1	EPX-3	EPX-1	CLG-4/RA1		
05	EDUCATION CENTER		N/A	PT-1/PT-2	PT-1	PT-1	PT-1	CLG-4/RA1		
06	PASSAGE	CONC	B-1	PT-1	PT-1	PT-1	PT-1	CLG-1		
07	PUBLIC TOILET	CT-1	N/A	WT-1	WT-1	WT-1	WT-1	CLG-2		
08 09	PUBLIC TOILET MEETING ROOM STORAGE	CT-1 CONC	N/A	WT-1 PT-1	WT-1 PT-1	WT-1 PT-1	WT-1 PT-1	CLG-2 CLG-1		
13.1	WARM-LIT SHELL		N/A N/A	N/A	N/A	N/A	N/A	RA1		
14	FERAL CATS		N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2	PROVIDE HOLD-DOWN CLIPS AT CLG-2	
15	CAT WORKROOM		N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2		
16	CAT QUAR.	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2	PROVIDE HOLD-DOWN CLIPS AT CLG-2	
17	MED. CAT		N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2	PROVIDE HOLD-DOWN CLIPS AT CLG-2	
18	CAT VIEWING CORRIDOR	CONC	N/A	PT-1	PT-1	PT-1	PT-1	CLG-1		
19 20	CAT COMM CAT COMM	RES-1	B-2 B-2	RES-2 RES-2	RES-2	RES-2 RES-2	RES-2 RES-2	CLG-2 CLG-2	PROVIDE HOLD-DOWN CLIPS AT CLG-2 PROVIDE HOLD-DOWN CLIPS AT CLG-2	
21	CAT ADOPTION	CONC	N/A	EPX-1	EPX-1	EPX-2	EPX-2	CLG-2	PROVIDE HOLD-DOWN CLIPS AT CLG-2	
22	CAT ADOPTION		N/A	EPX-1	EPX-1	EPX-2	EPX-2	CLG-2	PROVIDE HOLD-DOWN CLIPS AT CLG-2	
23	STRAY CATS	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2	PROVIDE HOLD-DOWN CLIPS AT CLG-2	
24	CAT GET ACQUAINTED		N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2	PROVIDE HOLD-DOWN CLIPS AT CLG-2	
25	CAT COMM	RES-1	B-2	RES-2	RES-2	RES-2	RES-2	CLG-2	PROVIDE HOLD-DOWN CLIPS AT CLG-2	
25A	CATIO	RES-1	N/A	N/A	RES-2	RES-2	N/A	CLG-7		
26	CATIO	RES-1	B-2	RES-2	RES-2	RES-2	RES-2	CLG-2	PROVIDE HOLD-DOWN CLIPS AT CLG-2	
26A 27	CATIO CAT GET ACQUAINTED	RES-1 CONC	N/A N/A	N/A EPX-1	RES-2 EPX-1	N/A EPX-1	RES-2 EPX-1	CLG-7 CLG-2	PROVIDE HOLD-DOWN CLIPS AT CLG-2	
28	RECEPTION	CONC	B-1	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2 CLG-4/RA1	. NOVIDE HOLD-DOWN CLIFS AT CLU-2	
29	OTHER ANIMALS	CONC	N/A	EPX-2	EPX-1	EPX-1	EPX-1	CLG-2		
30	OTHER ANIMALS	CONC	N/A	EPX-2	EPX-1	EPX-1	EPX-1	CLG-2		
31	FOSTER STORAGE		N/A	PT-1	PT-1	PT-1	PT-1	CLG-1		
32	FOOD GIVE AWAY	CONC	N/A	PT-1	PT-1	PT-1	PT-1	CLG-1		
33	GET ACQUAINTED	CONC	N/A	EPX-2	EPX-1	EPX-1	EPX-1	CLG-2		
34 25	GET ACQUAINTED GET ACQUAINTED	CONC	N/A	EPX-2	EPX-1	EPX-1	EPX-1	CLG-2		
35 36	GROOMING	RES-1	N/A B-2	EPX-2 EPX-2	EPX-1	EPX-1	EPX-1	CLG-2 CLG-2		
37	STAFF BREAKROOM	LVT-1	B-1	PT-2	PT-1	PT-1	PT-1	CLG-2 CLG-1		
38	BEHAVIOR ASSESMENT	RES-1	B-2	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2		
39	PUBLIC CORRIDOR		N/A	PT-1	PT-1	PT-1	PT-1	CLG-1		
40	STAFF CORRIDOR	CONC	N/A	PT-1	PT-1	PT-1	PT-1	CLG-1		
41	BLDG & TRADES STORAGE	CONC	N/A	PT-1	PT-1	PT-1	PT-1	CLG-1		
42	ANIMAL RECEIVING	RES-1	B-2	RES-2	RES-2	RES-2	RES-2	CLG-2		
43	DOG HOLDING	RES-1	B-2	RES-2	RES-2	RES-2 PT-1	RES-2	CLG-2	DOG RUNS SHALL RECEIVE RES-1 ON FLOOR AND RES-2 WALLS IN THEIR ENTIRETY	
44 45	STAFF TOILET STAFF TOILET	CT-1 CT-1	B-3 B-3	PT-1 PT-1	PT-1	PT-1	PT-1 PT-1	CLG-2		
46	EUTHANASIA	RES-1	B-2	RES-2	RES-2	RES-2	RES-2	CLG-2		
47	WALK IN FREEZER	PREFINISHED						PREFINISHED		
48	JAN.	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2		
49	STAFF SHOWER	CONC/RES-1	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2/CLG-3	SHOWER SHALL RECEIVE RES-1 ON FLOORS AND RES-2 WALLS IN THEIR ENTIRETY	
150	DATA CLOSET	CONC	N/A	PT-1	PT-1	PT-1	PT-1	CLG-1		
51	ATTENDANT	LVT-1	B-1	PT-1	PT-1	PT-1	PT-1	CLG-1		
52 53	OPEN OFFICE ADMIN ASSITANT	LVT-1	B-1 B-1	PT-1 PT-1	PT-1	PT-1	PT-1 PT-1	CLG-1		
154	SECURE STORAGE	LVT-1	В-1	PT-1	PT-1	PT-1	PT-1	CLG-1		
55	SHELTER SUPERVISOR	LVT-1	B-1	PT-1	PT-1	PT-1	PT-1	CLG-1		
56	WORKROOM	LVT-1	B-1	PT-1	PT-1	PT-1	PT-1	CLG-1		
57	CHIEF'S OFFICE	LVT-1	B-1	PT-1	PT-1	PT-1	PT-1	CLG-1		
58	ACO OFFICE	LVT-1	B-1	PT-1	PT-1	PT-1	PT-1	CLG-1		
59	SALLY PORT		N/A	PT-1	PT-1	PT-1	PT-1	RA1		
60	STORAGE	CONC	N/A	PT-1	PT-1	PT-1	PT-1	RA1		
61 62	STORAGE	CONC	N/A	PT-1	PT-1	PT-1	PT-1	RA1		
62 63	STORAGE ELECTRICAL	CONC	N/A N/A	PT-1 PT-1	PT-1	PT-1 PT-1	PT-1 PT-1	RA1		
64	FOOD AND LITTER STORAGE	CONC	N/A N/A	PT-1	PT-1	PT-1	PT-1	CLG-2		
65	WATER/GAS	CONC	N/A	PT-1	PT-1	PT-1	PT-1	CLG-2		
66	FOOD PREP	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2		
67	STRAY DOG PUBLIC WALKWAY	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-5	DOG RUNS SHALL RECEIVE RES-1 ON FLOOR AND RES-2 WALLS IN THEIR ENTIRETY	
68	STRAY DOG STAFF WALKWAY	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-5	DOG RUNS SHALL RECEIVE RES-1 ON FLOOR AND RES-2 WALLS IN THEIR ENTIRETY	
69	DOG DISH WASH	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2	, NES Z VACES IIV HIEIN EIVHNETT	
70	TOILET	RES-1	B-2	PT-1	PT-1	PT-1	PT-1	CLG-2		
71	TOILET	RES-1	B-2	PT-1	PT-1	PT-1	PT-1	CLG-2		
72	STAFF CORRIDOR	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-5		
73	NURSING MOTHERS	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-5	DOG RUNS SHALL RECEIVE RES-1 ON FLOOR AND RES-2 WALLS IN THEIR ENTIRETY	
74	MEDICAL DOGS	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-5	DOG RUNS SHALL RECEIVE RES-1 ON FLOOR AND RES-2 WALLS IN THEIR ENTIRETY	
75 76	MEDICAL DOGS	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-5	DOG RUNS SHALL RECEIVE RES-1 ON FLOOR AND RES-2 WALLS IN THEIR ENTIRETY	
76	QUARANTINE DOGS	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-5	DOG RUNS SHALL RECEIVE RES-1 ON FLOOR AND RES-2 WALLS IN THEIR ENTIRETY	
77 70	DOG LAUNDRY	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2		
78 79	PUBLIC CORRIDOR		N/A	EPX-1	EPX-1	EPX-1	•	CLG-2 CLG-5	DOG BLING CHALL BECEIVE BEG 4 ON FLOOR	
79 80	DOG ADOPTION PUBLIC WALKWAY DOG ADOPTION STAFF WALKWAY	CONC	N/A N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-5	DOG RUNS SHALL RECEIVE RES-1 ON FLOOR AND RES-2 WALLS IN THEIR ENTIRETY DOG RUNS SHALL RECEIVE RES-1 ON FLOOR	
80 81	DOG ADOPTION STAFF WALKWAY	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-5	AND RES-2 WALLS IN THEIR ENTIRETY DOG RUNS SHALL RECEIVE RES-1 ON FLOOR	
υI	DOG ADOPTION PUBLIC WALKWAY	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-5	AND RES-2 WALLS IN THEIR ENTIRETY DOG RUNS SHALL RECEIVE RES-1 ON FLOOR	
87		COINC	13/ 🔼	LI 7-1	LI /\-1	F1 //-1	L1 //-1	CEG-3		
		CONC	N/Δ	FPX-1	FPX-1	FPX-1	FPX-1	CLG-5	AND RES-2 WALLS IN THEIR ENTIRETY DOG RUNS SHALL RECEIVE RES-1 ON FLOOR	
83	DOG ADOPTION STAFF WALKWAY	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-5	DOG RUNS SHALL RECEIVE RES-1 ON FLOOR AND RES-2 WALLS IN THEIR ENTIRETY	
82 83 84 85	DOG ADOPTION STAFF WALKWAY FOOD PREP	CONC	N/A	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2	DOG RUNS SHALL RECEIVE RES-1 ON FLOOR	
3	DOG ADOPTION STAFF WALKWAY		,						DOG RUNS SHALL RECEIVE RES-1 ON FLOOR	

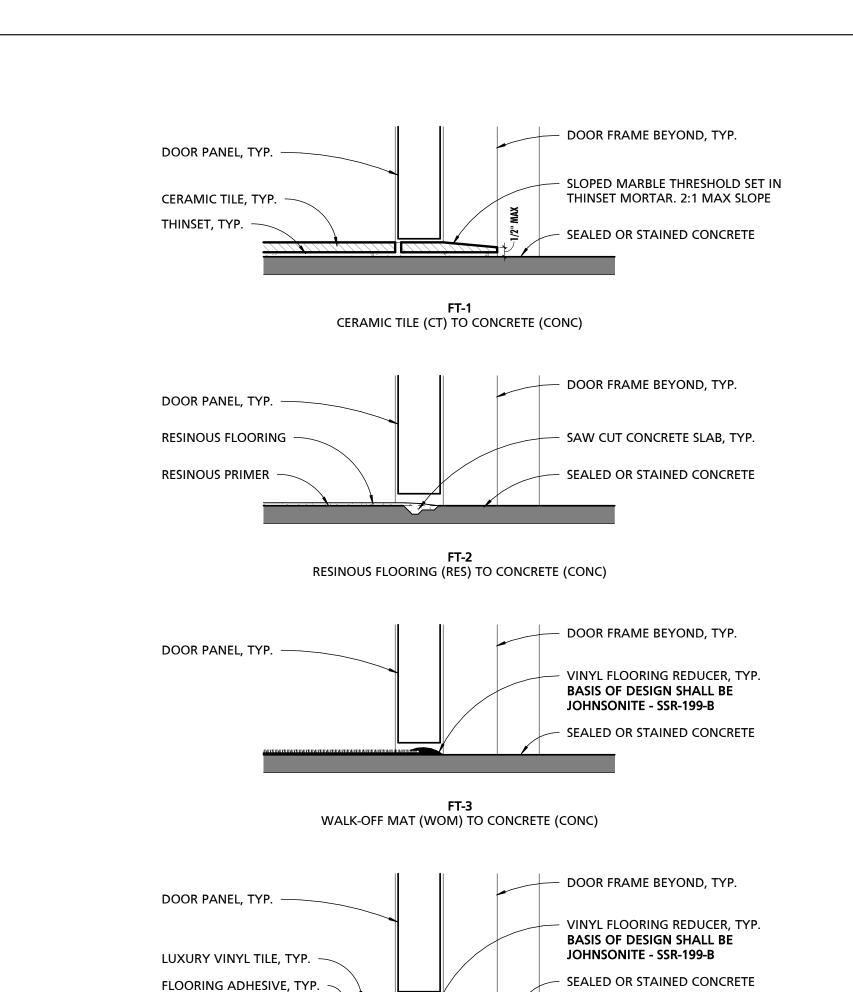
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MARK	DESCRIPTION	BOD MANUFACTURER	BOD MODEL/PRODUCT LINE	COLOR SELECTION	BOD COMMENTS
B-1	4" RUBBER BASE - COLOR 1	JOHNSONITE	TRADITIONAL RUBBER BASE	DOCKSIDE	
B-2	4" RESINOUS COVE BASE	DUREX	DYMAFLAKE	ROBINS EGG W/ CUSTOM FLAKES	
B-3	6x12 CERAMIC TILE COVE BASE	CROSSVILLE	BOHEMIA	BEATNIK	
CONC	SEALED CONCRETE	N/A	N/A	N/A	
CT-1	12x24 CERAMIC FLOOR TILE - COLOR 1	CROSSVILLE	BOHEMIA	BEATNIK	
EPX-1	EPOXY PAINT - COLOR 1	MC CORMICK PAINTS	N/A	MOON MIST	
EPX-2	EPOXY PAINT - COLOR 2	SHERWIN-WILLIAMS	N/A	OSAGE ORAGE	
EPX-3	EPOXY PAINT - COLOR 3	SHERWIN-WILLIAMS	N/A	CITYSCAPE	
EPX-4	EPOXY PAINT - COLOR 3	SHERWIN-WILLIAMS	N/A	STAY IN LIME	
FT-#	FLOORING TRANSITION TYPE	N/A	N/A		SEE DETAIL 3/A107
HPC-1	HIGH-PERFORMANCE COATING - COLOR 1	MC CORMICK PAINTS	N/A	MOON MIST	
LVT-1	LUXURY VINYL TILE - COLOR 1	ARMSTRONG	NATURAL CREATIONS	SPETTRO W/ BLUE HAWAIIAN MIXER	
MP-1	METAL PANEL TYPE 1 - COLOR 1	ATAS INTERNATIONAL	VERSA-LOK	STAY IN LIME SW 9032	
MP-2.1	METAL PANEL TYPE 2 - COLOR 1	ATAS INTERNATIONAL	CORRA-LOK	SLATE BLUE	
MP-2.2	METAL PANEL TYPE 2 - COLOR 2	ATAS INTERNATIONAL	CORRA-LOK	CHARCOAL GREY	
PH-1	PHENOLIC RESIN - COLOR 1	BMT/NELSON	LABORATORY CASEWORK	LIGHT GREY	
PL-1	PLASTIC LAMINATE - COLOR 1	FORMICA	N/A	FOLKSTONE	
PL-2	PLASTIC LAMINATE - COLOR 2	FORMICA	N/A	MOUSE	
PL-3	PLASTIC LAMINATE - COLOR 3	NEVAMAR	N/A	SUNKEN TREASURE	
PT-1	WALL PAINT - COLOR 1	MC CORMICK PAINTS	N/A	MOON MIST	
PT-2	WALL PAINT - COLOR 2	SHERWIN-WILLIAMS	N/A	STAY IN LIME	
RES-1	RESINOUS FLOORING	DUREX	DYMAFLAKE	ROBINS EGG W/ CUSTOM FLAKES	
RES-2	RESINOUS WALL COATING	DUREX	DYMAFLAKE	ARCTIC	
SS-1	SOLID SURFACE - COLOR 1	CORIAN	SOLID SURFACE	MINERAL	
SS-2	SOLID SURFACE - COLOR 2	FORMICA	SOLID SURFACE	BOTTLE GLASS QUARTZ 770	
SS-3	SOLID SURFACE - COLOR 3	CORIAN	SOLID SURFACE	DEEP CLOUD	
STAIN	CONCRETE STAIN & SEALER	H&C CONCRETE	INFUSION	GOLD LEAF	SEE SPECIFICATIONS FOR STAIN & SEALER
ST STL	STAINLESS STEEL COUNTERTOP				COUNTERTOP W/ MARINE EDGE AND INTEGRAL BACKSPLASH
SW-1	SLAT WALL	MARLITE	SLATWALL	WINDSOR	PROVIDE PVC EDGE TRIM
WOM	20x20 WALK-OFF CARPET TILE	MOHAWK GROUP	TUFF STUFF II	COBALT	
WT-1	12x24 CERAMIC WALL TILE - COLOR 1	CROSSVILLE	ВОНЕМІА	TINKER	

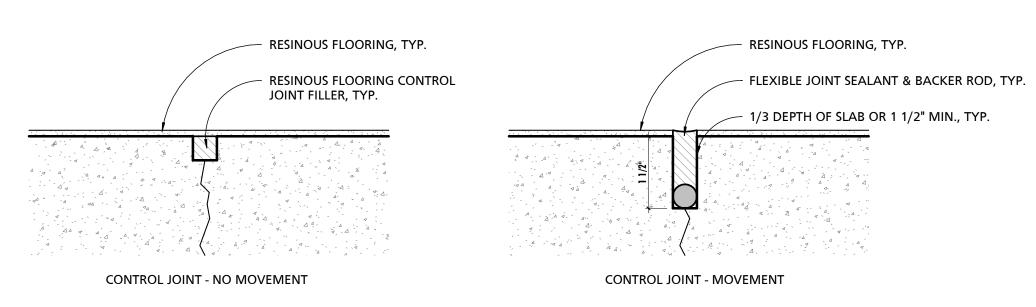
	SCHEDULE - CEILING TYPES							
MARK	DESCRIPTION	BOD MANUFACTURER	BOD MODEL	COMMENTS				
CLG-1	2x2 ACOUSTICAL CEILING TILE	USG	BASIC - FISSURED					
CLG-2	2x2 VINYL CEILING TILE	USG	CLEAN ROOM	PROVIDE GASKETED TEE FLANGES				
CLG-3	1/2" GWB OVER 3 5/8" METAL STUDS @ 16" O.C.	N/A	N/A	MOISTURE & MOLD RESISTANT GWB IN WET LOCATIONS				
CLG-4	8" NON-PERFORATED, LINEAR METAL CEILING W/ WOOD TEXTURE	ARMSTRONG	METALWORKS - LINEAR - PERFORATED	EXPOSED EDGES SHALL RECEIVE 6" AXIOM EDGE TRIM. RECESSED LIGHTING TO RECEIVE TRIM BY CLG MANUF.				
CLG-5	2x2 CERAMIC CEILING TILE	USG	RADAR CERAMIC ACOUSTICAL PANELS					
CLG-6	8" PERFORATED, LINEAR METAL SOFFIT W/ WOOD TEXTURE	ARMSTRONG	METALWORKS - LINEAR - EXTERIOR	PROVIDE COMPRESSION POSTS AS REQUIRED BY MANUF. FOR WIND UPLIFT				
CLG-7	LINEAR METAL SOFFIT	ATAS INTERNATIONAL	DWF					
CLG-8	8" PERFORATED, LINEAR METAL SOFFIT	ARMSTRONG	METALWORKS - LINEAR - EXTERIOR	PROVIDE COMPRESSION POSTS AS REQUIRED BY MANUF. FOR WIND UPLIFT				

	GENERAL FINISH NOTES						
NOTE #	NOTE						
1	ALL CONCRETE SLAB CONTROL JOINTS SHALL BE FILLED FLUSH WITH URETHANE SEALANT						
2	ALL EXPOSED STRUCTURAL STEEL AND METAL DECK WITHIN INTAKE LOBBY 103, ADOPTION LOBBY 104 AND EDUCATION CENTER 105 SHALL BE COVERED IN HPC-1						
3	ALL MECHANICAL, ELECTRICAL, PLUMBING, TO OCCUR IN AREAS WHERE THE STRUCTURE IS EXPOSED OR VISIBLE SHALL BE EXECUTED IN A COORDINATED, NEAT AND WORKMANLIKE MANNER. AT A MINIMUM ALL WIRING SHALL BE RUN THOUGH CONDUITS, PIPE AND DUCT INSULATION SHALL BE NEATLY INSTALLED AND PAINTABLE. ALL PENETRATIONS SHALL EITHER BE NEATLY COPED OR UTILIZE PAINTABLE ESCUTCHEONS/COVER PLATES. ALL PIPES AND DUCTS SHALL BE RUN EITHER PERPENDICULAR OR PARALLEL TO WALL CONSTRUCTION AND SHALL BE INSTALLED AT THE SAME NOMINAL ELEVATION OR SLOPE. ALL MATERIALS AND INSTALLATION METHODS SHALL COMPLY WITH APPLICABLE CODES AND STANDARDS. WHERE MECHANICAL, ELECTRICAL, AND PLUMBING DRAWINGS INDICATE OTHER REQUIREMENTS THE GREATER QUALITY SHALL PREVAIL.						
4	CONCRETE CONTROL JOINTS NOT INDICATED. GC SHALL PROVIDE SHOP DRAWINGS OF CONTROL JOINTS FOR ALL LOCATIONS WITH SEALED AND STAINED CONCRETE FLOOR FINISHES.						
5	REFER TO A700 SERIES FOR ADDITIONAL FINISH REQUIREMENTS.						

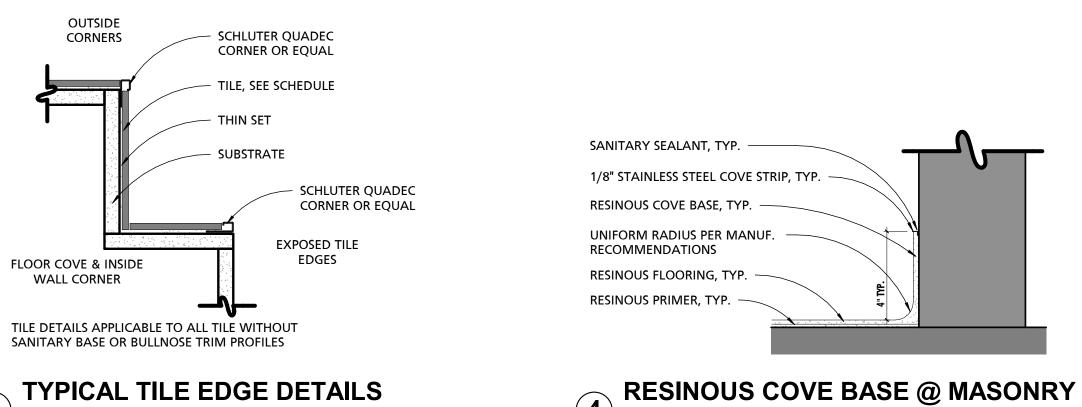
REFER TO PROJECT MANUAL FOR ADDITIONAL FINISH REQUIREMENTS OUTLINED IN ALTERNATE 001: RESINOUS FLOOR EXTENTS



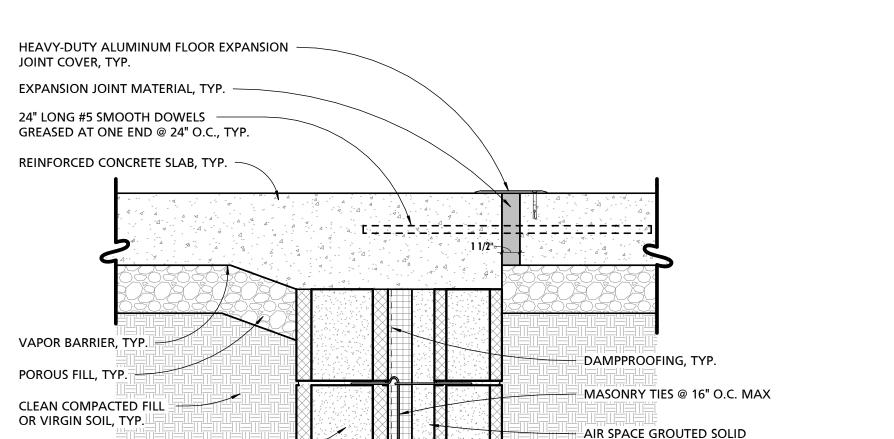




RESINOUS FLOOR DETAIL @ CONTROL JOINTS 6" = 1'-0"



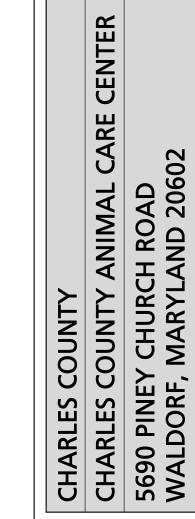




RIGID INSULATION, TYP.

5 TYP EXPANSION JOINT DETAIL

REINFORCED CMU FOUNDATION WALL, TYP.



ARCHITECTURE + MASTER PLANNING

10839-D PHILADELPHIA RD

(E) INFO@MWSARCH.COM

I HEREBY CERTIFY THAT THESE DOCUMENTS WERE PREPARED OR APPROVED BY ME, AND THAT I AM A

DULY LICENSED PROFESSIONAL ARCHITECT UNDER THE LAWS OF THE STATE OF MARYLAND. LICENSE NUMBER: #15505 EXPIRATION DATE: 8-18-2020

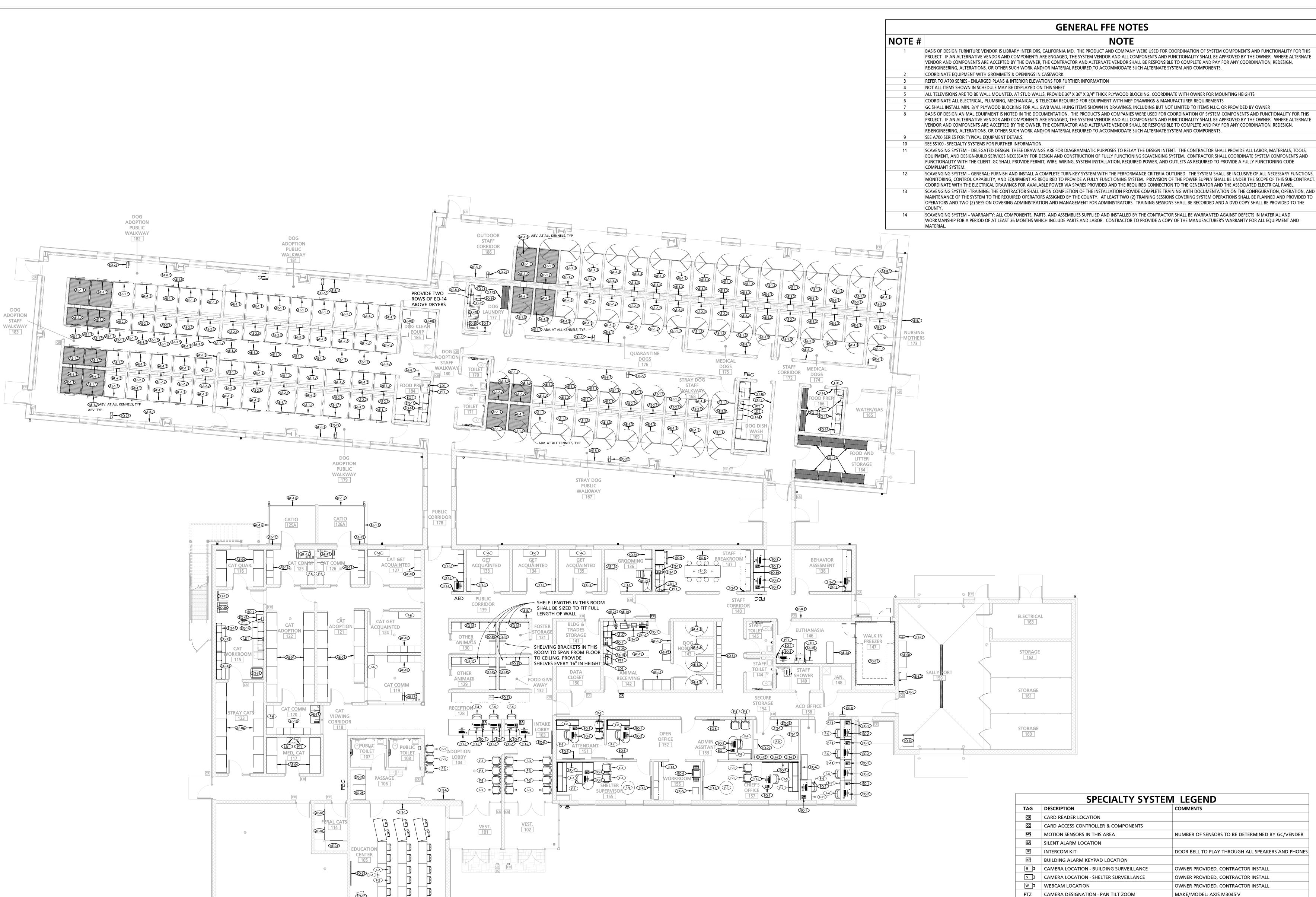
www.mwsarch.com

WHITE MARSH, MD 21162

(P) 410-344-1460 (F) 443-403-2460

PROJECT NUMBER: PROJECT SET: PERMIT DATE ISSUED: 12/23/2019 DRAWING TITLE: FINISH SCHEDULE & DETAILS SHEET NUMBER:

NO. DESCRIPTION DATE



MEETING

ROOM STORAGE 109

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ARCHITECTURE + MASTER PLANNING

10839-D PHILADELPHIA RD
WHITE MARSH, MD 21162

(P) 410-344-1460

(F) 443-403-2460

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of America"

CHARLES COUNTY ANIMAL CARE CENTER
5690 PINEY CHURCH ROAD
WALDORF, MARYLAND 20602

NO. DESCRIPTION DATE

PROJECT NUMBER:
18-034
PROJECT SET:
PERMIT
DATE ISSUED:

EXT CAMERA DESIGNATION - EXTERIOR

RESISTANT SPEAKERS

PA/MUSIC ZONE BOUNDARY

ZONE 7 PA ZONE VIA PHONES - NO MUSIC

WDR CAMERA DESIGNATION - WIDE DYNAMIC RANGE

ZONE 4-6 INDIVIDUAL MUSIC & PA ZONES VIA MOISTURE

ZONE 8 PA ZONE VIA EXTERIOR SPEAKERS - NO MUSIC

ZONE 1-3 INDIVIDUAL MUSIC & PA ZONES VIA INTERIOR SPEAKERS

MAKE/MODEL: AXIS M3225-LVE

PHONES ARE OWNER PROVIDED AND INSTALLED

MAKE/MODEL: AXIS M3105-L

12/23/2019

DRAWING TITLE:
FFE PLAN

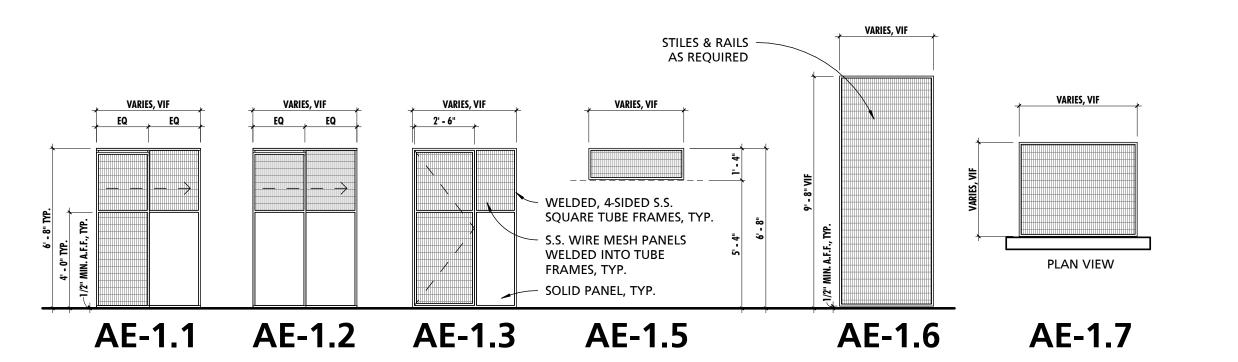
MARK	DESCRIPTION	BOD MANUFACTURER	BOD MODEL	OWNER FURNISH AND INSTALL	OWNER FURNISH CONTRACTOR INSTALL	CONTRACTOR FURNISH AND INSTALL	
	TELEPHONE	BOD MANOFACTORER	BOD MODEL	•	INSTALL	INSTALL	COMMENTS CONTRACTOR TO PROVIDE POWER AND DATA. REFER TO PLAN FOR DESKTOP VS. WALL-MOUNTED LOCATIONS
FO-2	COMPUTER			•			CONTRACTOR TO PROVIDE POWER AND DATA
	S.S. WALL SHELF	ULINE	H-7498	-		•	SURFACE @ 34" A.F.F. MAX
	PRINTER	KYOCERA	ECOSYS P8060CDN	•			501117142 5 5 7 7 11 11 11 11 11 5 C
	SHREDDER	FELLOWES	225CI	•			
	SMART TELEVISION	1 222 1121		_		•	
	SECURITY MONITOR					•	
	WALL-MOUNTED PISTOL LOCKER	TIFFIN	WSL15082203KNAA			•	
	REFRIGERATOR W/ FREEZER	KENMORE	51763			•	CONTRACTOR TO PROVIDE PLUMBING
	REFRIGERATOR	KENMORE	70722			•	
	UNDER -COUNTER MINI-FRIDGE	KENMORE	99029			•	
	MICROWAVE	KENMORE	75653			•	
	COFFEE MAKER	KEURIG	K150P			•	CONTRACTOR TO PROVIDE PLUMBING
	14"D WIRE, ADJUSTABLE SHELVING SYSTEM	E-Z SHELVING SYSTEMS, INC.	HEAVY-DUTY WIRE SHELVING SYSTEM			•	UPWRIGHTS/BRACKETS SHALL BE PROVIDED @ 24" O.C. UNLESS WHERE NOTED TO FIT FULL LENGTH OF WALL. SEE INTERIOR ELEVATIONS FOR ROW COUNT
EQ-15	42"Wx63"Hx18"D FILE CABINET	EXISTING	EXISTING	•			EXISTING TO BE RELOCATED
EQ-16	UNDER-COUNTER COMMERCIAL DISHWASHER	HOBART	LXEC-3			•	
EQ-17	14"Dx54"L S.S. WIRE SHELVING RACK	EAGLE GROUP	QA14			•	
	24"Dx60"L S.S. WIRE SHELVING RACK	EAGLE GROUP	QA24			•	
	18"Dx60"L S.S. WIRE SHELVING RACK	EAGLE GROUP	QA18			•	
	RESIDENTIAL WASHER	N/A	N/A	•			CONTRACTOR TO PROVIDE PLUMBING
	RESIDENTIAL ELECTRIC DRYER	N/A	N/A	•			CONTRACTOR TO PROVIDE POWER AND EXHAUST
	36"Wx72"Hx18"D GUN LOCKER	EXISTING	EXISTING	•			EXISTING TO BE RELOCATED
	COUNTERTOP PRINTER	KYOCERA	ECOSYS P5021CDW	•			
	TOUCH SCREEN TELEVISION	MONDOPAD				•	
	VENDING MACHINE - SNACKS			•			CONTRACTOR TO PROVIDE POWER
	VENDING MACHINE - SODA			•			CONTRACTOR TO PROVIDE POWER
	75' HEAVY-DUTY HOSE REEL	REELCRAFT	SERIES 80000			•	PROVIDE WALL-MOUNTED UNIVERSAL SWING BRACKET ACCESSORY
EQ-28	30"Wx63"Hx18"D FILE CABINET	EXISTING	EXISTING	•			EXISTING TO BE RELOCATED
EQ-29	WALL-MOUNTED DRUG SAFE			•			CONTRACTOR TO PROVIDE BLOCKING IN WALL AND COORDINATE FINAL LOCATION W/ OWNER PRIOR TO INSTALLATION.
EQ-30	LECTERN PODIUM					•	
EQ-31	12"Wx12"Dx36"H 2-TIER LOCKER	GRAVITY	LENOX LOCKER			•	PROVIDE 4" BASE, SLOPE TOP & STANDARD HASP LOCK TYPE
EQ-32	12"Wx15"Dx12"H 5-TIER LOCKER	GRAVITY	LENOX LOCKER			•	PROVIDE 4" BASE, SLOPE TOP & STANDARD HASP LOCK TYPE
EQ-33	24"Dx72"Lx36"H S.S. WORK TABLE	EAGLE GROUP	T2484SB-BS			•	
EQ-34	MANUAL ROLLER SHADE	HUNTER DOUGLAS	RB 500 - WALL MOUNTED			•	SEE RCP FOR LOCATIONS. SHADES SHALL BE MOISTURE RESISTANT IN ANIMAL AREAS.
EQ-35	18"D LOUVERED, ADJUSTABLE SHELVING SYSTEM	E-Z SHELVING SYSTEMS, INC.	HEAVY-DUTY LOUVERED SHELVING SYSTEM			•	UPWRIGHTS/BRACKETS SHALL BE PROVIDED @ 24" O.C. UNLESS WHERE NOTED TO FIT FULL LENGTH OF WALL. SEE INTERIOR ELEVATIONS FOR ROW COUNT
EQ-36	MAGNETIZED DRY ERASE BOARD	LIBRARY INTERIORS, INC.	WMMP4896			•	
EQ-39	FREE-STANDING COMMERCIAL DISHWASHER	HOBART	AM 15VL-2			•	
EQ-45	MIN-FRIDGE W/ FREEZER	KENMORE	46-99763			•	
EQ-51	WALK-IN FREEZER	MASTERBILT	10-BILT			•	

		ANIW	AL EQUIPMENT SCH	EDULE			
MARK DESC	CRIPTION	BOD MANUFACTURER	BOD MODEL	OWNER FURNISH AND INSTALL	OWNER FURNISH CONTRACTOR INSTALL	CONTRACTOR FURNISH AND INSTALL	COMMENTS
AE-1.1 DOG KENNEL SLIDE GATE W/ OP		MASON COMPANY				•	PUBLIC FACING ADOPTABLE DOGS
AE-1.2 DOG KENNEL SLIDE GATE w/ (2)		MASON COMPANY				•	STAFF CORRIDOR ADOPTABLE DOGS
AE-1.3 DOG KENNEL SWING GATE w/ O	PAQUE ACCENT PANEL	MASON COMPANY				•	
AE-1.5 DOG KENNEL FLAG PANEL		MASON COMPANY				•	
AE-1.6 CATIO WALL PANEL AE-1.7 DOG KENNEL COVER PANEL		MASON COMPANY MASON COMPANY				•	
AE-2.2 GUILOTINE DOOR - MEDIUM		MASON COMPANY	16" x 28"			•	INSTALL ON STAFF SIDE OF DOG RUN
AE-2.3 GUILOTINE DOOR - LARGE		MASON COMPANY	16" x 32"			•	INSTALL ON STAFF SIDE OF DOG RUN
AE-3.2 INSULATED PET DOOR - MEDIUM		CARLSON	16" x 28"			•	INSTALL ON EXTERIOR SIDE OF DOG RUN
AE-3.3 INSULATED PET DOOR - LARGE		CARLSON	16" x 32"			•	INSTALL ON EXTERIOR SIDE OF DOG RUN
AE-04 CAT SUITE - DOUBLE UNIT		SHOR-LINE	902.0103.24			•	TWO ROWS SHALL BE PROVIDED AT ALL LOCATIONS. PROVIDE FILLERS AT ENDS OF CAGE RUNS AS REQUIRED TO INFILL GAP BETWEEN CAGE AND END WALL. SEE 8/A700 FOR RECESSED WADETAIL
AE-5.1 DOG MEDICAL HOLDING CAGE		SHOR-LINE	902.0105.42				PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100° CAGES SHALL BE RECESSED IN WALL AND SIT 8" A.F.F. SEE DETA 8/A700
AE-5.2 DOG MEDICAL HOLDING CAGE		SHOR-LINE	902.0110.22			•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A1001 CAGES SHALL BE RECESSED IN WALL AND SIT 8" A.F.F. SEE DETA 8/A700
AE-07 CAT INTAKE CAGE		SHOR-LINE SHOR-LINE	902.2424.70			•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A1001 TWO ROWS SHALL BE PROVIDED AT ALL LOCATIONS. SEE 8/A70 FOR RECESSED WALL DETAIL TWO ROWS SHALL BE PROVIDED AT ALL LOCATIONS. SEE 8/A70
							FOR RECESSED WALL DETAIL
AE-08 CENTRAL PRESSURE WASHING SY		SMT	300-5041 MOMENTUM PLUS 2.1P			•	CONTRACTOR TO PROVIDE 3/4" FRT PLYWOOD BACKING
AE-8.1 PRESSURE WASH REMOTE STATIC		SMT	300-5217, 300-1996			•	
AF 00 CROOMING TUR	HOSE REEL	SMT	600W			•	DROVIDE FALICET AND LIGGE 994 9996 19
AE-09 GROOMING TUB	COTICS CARINITY	SHOR-LINE	904.0702.31			•	PROVIDE FAUCET AND HOSE 804.0006.10
AE-10 18"Wx15"Hx8"D LOCKABLE NARO AE-11 SURGERY LIGHT	OTICS CABINET	PARAGON MEDICAL SHOR-LINE	PRELUDE DUAL LED - CEILING MOUNT			•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100
AE-11 JORGENT LIGHT		SHOR-LINE SHOR-LINE	605.3014.04				W/ POST-MOUNT DISPLAY
AE-13 CAT DOOR - EXTERIOR WALL MO	NUNTED	HALE	8.5" x 12.5" "MEDIUM"			•	W/ 1 OST-WOOM DISI EAT
AE-14 PASS THROUGH INSTRUMENT CA		CONTINENTAL METAL PRODUCTS				•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100
AE-15 GROOMING TABLE		SHOR-LINE	903.3220.37			•	
AE-16 CAT SCALE		SHOR-LINE	905.0400.01			•	
AE-17 CAT TREE		N/A	N/A	•			
AE-18 WALL MOUNT CAT SHELVES		MASON COMPANY	MOUNTED CAT SHELF			•	SEE 10/A700 FOR TYPICAL CONFIGURATION
AE-19 ADJUSTABLE HEIGHT EXAM TAB	LE	SHOR-LINE	903.4000.01			•	
AE-20 WALL-MOUNTED ANESTHESIA		SHOR-LINE	195.1056.00	_		•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100
AE-21 AUTOCLAVES AE-22 INSTRUMENT WASHER		EXISTING SCICAN	EXISTING HYDRIMG4	•			PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100
AE-23 LIFT EXAM SCALE TABLE		SHOR-LINE	916.3400.02			•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100
AE-24 WET TABLE		SHOR-LINE	904.3000.00			•	PROVIDED IN ALTERNATE 004 - SPAT/NEOTER CLINIC. SEE A100 PROVIDE ECONOMY DECK MOUNT FAUCET 804.0006.51 AND SOLID TOP PANEL ACCESSORY. ADDITIONAL EQUIPMENT PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100
AE-25 BLOOD ANALYZER		EXISTING	EXISTING	•			
AE-26 MICROSCOPE		EXISTING	EXISTING	•			
AE-27 CENTRIFUGE		EXISTING	EXISTING	•			
AE-28 PORTABLE ANESTHESIA UNIT AE-29 SCAVENGING SYSTEM - ALARM P	ANEL	SHOR-LINE DELEGATED DESIGN: BY GC'S VENDOR	195.1038.00			•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100 PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100
AE-30 SCAVENGING SYSTEM - WALL-MO		DELEGATED DESIGN: BY GC'S VENDOR				•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100 EXPOSED PIPING TO BE HELD OFF WALL MIN 2" FOR CLEANABII
AE-31 SCAVENGING SYSTEM - WALL-MO		DELEGATED DESIGN: BY GC'S VENDOR				•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100 EXPOSED PIPING TO BE HELD OFF WALL MIN 2" FOR CLEANABI
AE-32 SCAVENGING SYSTEM - VACUUM	PUMP	DELEGATED DESIGN: BY GC'S VENDOR				•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100 UNIT MOUNTED TO SHELF ABOVE CEILING. PROVIDE DEDICATE POWER OUTLET AT UNIT LOCATION OPERATED BY WALL SWITC LOCATED IN PREP AREA 113.2. PROVIDE 1/2" EXHAUST PIPING THROUGH ROOF W/ BOOT.
AE-33 OXYGEN TANK - H CYLINDER W/	CHAIN			•			
AE-34 SCAVENGING SYSTEM - CEILING-I		DELEGATED DESIGN: BY GC'S VENDOR				•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100
AE-35 SCAVENGING SYSTEM - CEILING-I	MOUNT OXYGEN EXHAUST OUTLET	VENDOR				•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100
AE-36 SURGERY TABLE AE-37 INSTRUMENT STAND		SHOR-LINE SHOR-LINE	903.4000.01 802.0010.01			•	PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100 PROVIDED IN ALTERNATE 004 - SPAY/NEUTER CLINIC. SEE A100

FURNITURE SCHEDULE									
MARK	DESCRIPTION	MANUFACTURER	MODEL	FABRIC	FINISH	OWNER FURNISH AND INSTALL		CONTRACTOR FURNISH AND INSTALL	
F-1	60"x24" NESTING FLIP-TOP TABLE	OFFICE SOURCE	101-OZA067					•	
F-2	MAESTRO STACKING CHAIR	KI, INC	MSP-NG-XX-XX					•	
F-3	SIDERO ARMSHAIR	GLOBAL FURNITURE GROUP	6900-TUN-GR2					•	
F-4	TASK CHAIR	OFM	101-QXA399					•	
F-5	EXECUTIVE OFFICE CHAIR	OFM	101-RGL132					•	
F-6	BENCH	EXISTING	EXISTING			•			EXISTING TO BE RELOCATED
F-7	WORKSTATION	LIBRARY INTERIORS, INC	V\$7224DL42247824F36					•	
F-8	WORKSTATION	LIBRARY INTERIORS, INC	VS6024DL3624F					•	
F-9	36" DIA TABLE	LIBRARY INTERIORS, INC						•	
F-10	BREAK ROOM TABLE	OFM	ENDURE 9298					•	
F-11	MOBILE FILE PEDESTAL	LIBRARY INTERIORS, INC.	MP28.6612					•	

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GENERAL FFE NOTES NOTE NOTE # BASIS OF DESIGN FURNITURE VENDOR IS LIBRARY INTERIORS, CALIFORNIA MD. THE PRODUCT AND COMPANY WERE USED FOR COORDINATION OF SYSTEM COMPONENTS AND FUNCTIONALITY FOR THIS PROJECT. IF AN ALTERNATIVE VENDOR AND COMPONENTS ARE ENGAGED, THE SYSTEM VENDOR AND ALL COMPONENTS AND FUNCTIONALITY SHALL BE APPROVED BY THE OWNER. WHERE ALTERNATE VENDOR AND COMPONENTS ARE ACCEPTED BY THE OWNER, THE CONTRACTOR AND ALTERNATE VENDOR SHALL BE RESPONSIBLE TO COMPLETE AND PAY FOR ANY COORDINATION, REDESIGN, RE-ENGINEERING, ALTERATIONS, OR OTHER SUCH WORK AND/OR MATERIAL REQUIRED TO ACCOMMODATE SUCH ALTERNATE SYSTEM AND COMPONENTS. COORDINATE EQUIPMENT WITH GROMMETS & OPENINGS IN CASEWORK REFER TO A700 SERIES - ENLARGED PLANS & INTERIOR ELEVATIONS FOR FURTHER INFORMATION NOT ALL ITEMS SHOWN IN SCHEDULE MAY BE DISPLAYED ON THIS SHEET ALL TELEVISIONS ARE TO BE WALL MOUNTED. AT STUD WALLS, PROVIDE 36" X 36" X 3/4" THICK PLYWOOD BLOCKING. COORDINATE WITH OWNER FOR MOUNTING HEIGHTS COORDINATE ALL ELECTRICAL, PLUMBING, MECHANICAL, & TELECOM REQUIRED FOR EQUIPMENT WITH MEP DRAWINGS & MANUFACTURER REQUIREMENTS GC SHALL INSTALL MIN. 3/4" PLYWOOD BLOCKING FOR ALL GWB WALL HUNG ITEMS SHOWN IN DRAWINGS, INCLUDING BUT NOT LIMITED TO ITEMS N.I.C. OR PROVIDED BY OWNER BASIS OF DESIGN ANIMAL EQUIPMENT IS NOTED IN THE DOCUMENTATION. THE PRODUCTS AND COMPANIES WERE USED FOR COORDINATION OF SYSTEM COMPONENTS AND FUNCTIONALITY FOR THIS PROJECT. IF AN ALTERNATIVE VENDOR AND COMPONENTS ARE ENGAGED, THE SYSTEM VENDOR AND ALL COMPONENTS AND FUNCTIONALITY SHALL BE APPROVED BY THE OWNER. WHERE ALTERNATE VENDOR AND COMPONENTS ARE ACCEPTED BY THE OWNER, THE CONTRACTOR AND ALTERNATE VENDOR SHALL BE RESPONSIBLE TO COMPLETE AND PAY FOR ANY COORDINATION, REDESIGN, RE-ENGINEERING, ALTERATIONS, OR OTHER SUCH WORK AND/OR MATERIAL REQUIRED TO ACCOMMODATE SUCH ALTERNATE SYSTEM AND COMPONENTS. SEE A700 SERIES FOR TYPICAL EQUIPMENT DETAILS. SEE SS100 - SPECIALTY SYSTEMS FOR FURTHER INFORMATION. SCAVENGING SYSTEM – DELEGATED DESIGN: THESE DRAWINGS ARE FOR DIAGRAMMATIC PURPOSES TO RELAY THE DESIGN INTENT. THE CONTRACTOR SHALL PROVIDE ALL LABOR, MATERIALS, TOOLS, EQUIPMENT, AND DESIGN-BUILD SERVICES NECESSARY FOR DESIGN AND CONSTRUCTION OF FULLY FUNCTIONING SCAVENGING SYSTEM. CONTRACTOR SHALL COORDINATE SYSTEM COMPONENTS AND FUNCTIONALITY WITH THE CLIENT. GC SHALL PROVIDE PERMIT, WIRE, WIRING, SYSTEM INSTALLATION, REQUIRED POWER, AND OUTLETS AS REQUIRED TO PROVIDE A FULLY FUNCTIONING CODE COMPLIANT SYSTEM. SCAVENGING SYSTEM - GENERAL: FURNISH AND INSTALL A COMPLETE TURN-KEY SYSTEM WITH THE PERFORMANCE CRITERIA OUTLINED. THE SYSTEM SHALL BE INCLUSIVE OF ALL NECESSARY FUNCTIONS, MONITORING, CONTROL CAPABILITY, AND EQUIPMENT AS REQUIRED TO PROVIDE A FULLY FUNCTIONING SYSTEM. PROVISION OF THE POWER SUPPLY SHALL BE UNDER THE SCOPE OF THIS SUB-CONTRACT. COORDINATE WITH THE ELECTRICAL DRAWINGS FOR AVAILABLE POWER VIA SPARES PROVIDED AND THE REQUIRED CONNECTION TO THE GENERATOR AND THE ASSOCIATED ELECTRICAL PANEL. SCAVENGING SYSTEM -TRAINING: THE CONTRACTOR SHALL UPON COMPLETION OF THE INSTALLATION PROVIDE COMPLETE TRAINING WITH DOCUMENTATION ON THE CONFIGURATION, OPERATION, AND MAINTENANCE OF THE SYSTEM TO THE REQUIRED OPERATORS ASSIGNED BY THE COUNTY. AT LEAST TWO (2) TRAINING SESSIONS COVERING SYSTEM OPERATIONS SHALL BE PLANNED AND PROVIDED TO OPERATORS AND TWO (2) SESSION COVERING ADMINISTRATION AND MANAGEMENT FOR ADMINISTRATORS. TRAINING SESSIONS SHALL BE RECORDED AND A DVD COPY SHALL BE PROVIDED TO THE SCAVENGING SYSTEM – WARRANTY: ALL COMPONENTS, PARTS, AND ASSEMBLIES SUPPLIED AND INSTALLED BY THE CONTRACTOR SHALL BE WARRANTED AGAINST DEFECTS IN MATERIAL AND WORKMANSHIP FOR A PERIOD OF AT LEAST 36 MONTHS WHICH INCLUDE PARTS AND LABOR. CONTRACTOR TO PROVIDE A COPY OF THE MANUFACTURER'S WARRANTY FOR ALL EQUIPMENT AND MATERIAL.



2. AE-1.3 SOLID PANELS WITHIN STRAY DOG PUBLIC WALKWAY 167 SHALL ALTERNATE IN COLOR IN THE ORDER OF ORANGE, BLUE, SAGE, YELLOW AND JADE TYPES - ANIMAL ENCLOSURES

3. ALL OTHER SOLID PANELS SHALL BE PEARL

1. AE-1.1 SOLID PANELS SHALL ALTERNATE IN COLOR IN THE ORDER OF ORANGE, BLUE, SAGE, YELLOW AND JADE

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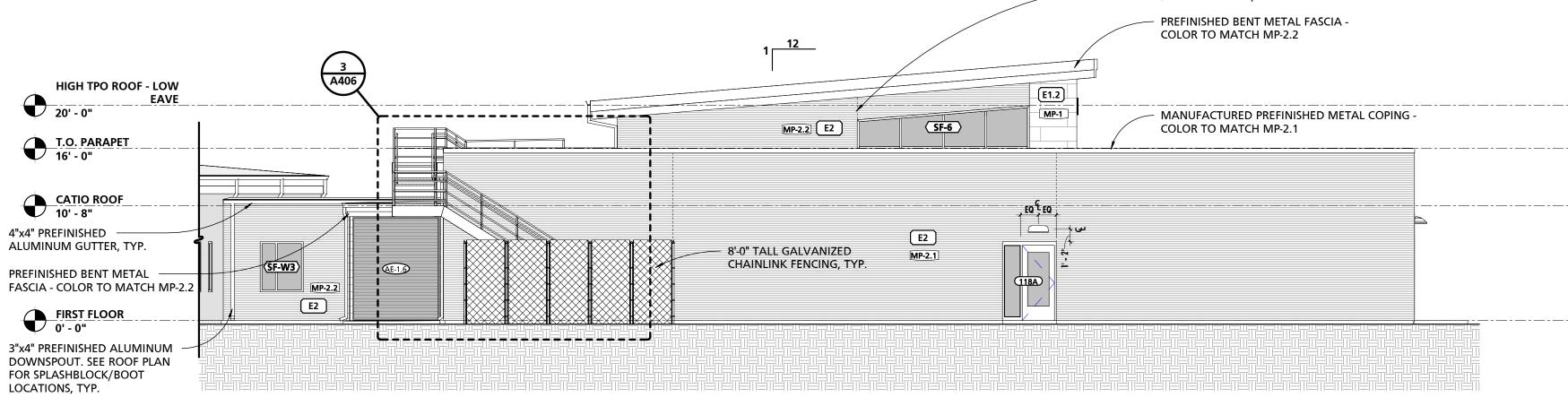
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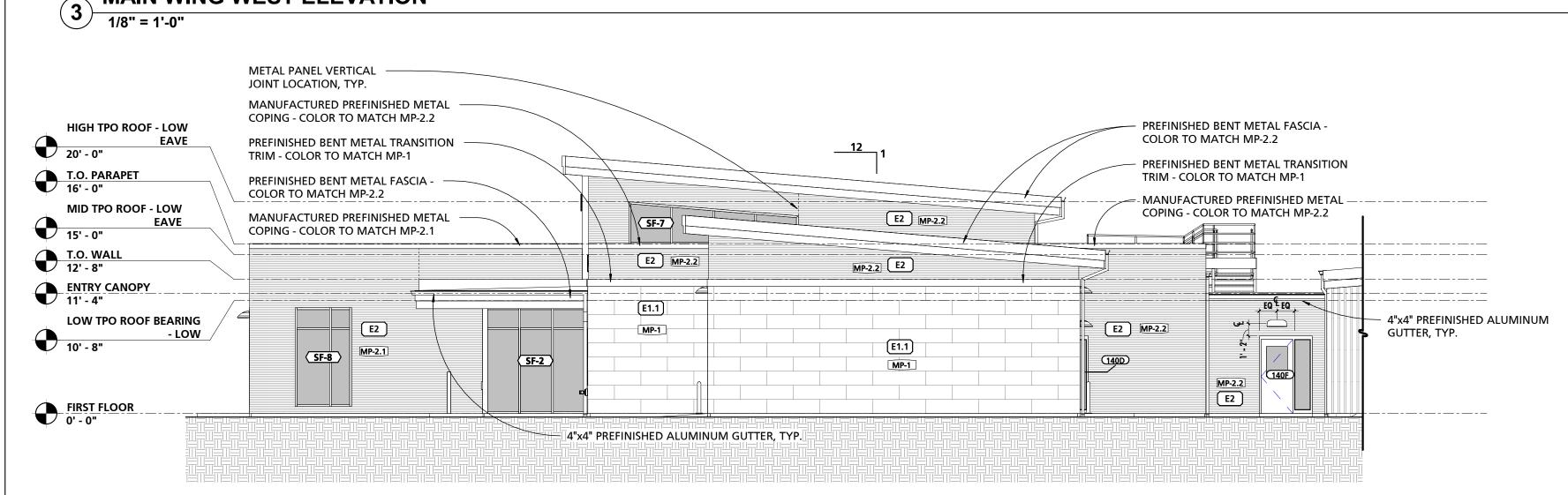
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12/23/2019 DRAWING TITLE: FFE SCHEDULES & NOTES



MAIN WING WEST ELEVATION



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MAIN WING EAST ELEVATION 1/8" = 1'-0"

E1.1 14 1/2" 10" CMU W/ LIQUID APPLIED AIR BARRIER, 2" RIGID INSULATION, 2 1/2" STUD FURRING AND METAL WALL PANEL - TYPE 1

13 1/4" 10" CMU W/ LIQUID APPLIED AIR BARRIER, 2" RIGID INSULATION, 3/4" SUBGIRTS AND METAL WALL PANEL - TYPE 2

17" 10" CMU, 2" RIGID INSULATION, AIR SPACE AND 4" CMU VENEER

E6 11 3/4" VAPOR BARRIER LINER SYSTEM OVER 9 1/2" GIRTS W/ THERMAL BLOCKING, (2) LAYERS MIN R-13 BATT INSULATION AND PEMB WALL PANEL

ROOF ASSEMBLY SCHEDULE

RA1 PEMB STANDING SEAM ROOF OVER 9 1/2" PURLINS W/ THERMAL BLOCKING, (1) LAYER MIN R-19 BATT INSULATION, (1) LAYER MIN R-11 BATT INSULATION AND A VAPOR BARRIER

RA3 | FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, 5" RIGID INSULATION AND SLOPED 1 1/2" METAL DECK RA4 FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, MIN 1" TAPERED RIGID INSULATION AND 1 1/2" METAL DECK

RA5 FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, MIN 5" TAPERED RIGID INSULATION AND 1 1/2" METAL DECK

GENERAL ELEVATION NOTES

1 SEE OTHER ELEVATIONS FOR TYPICAL NOTES.

2 SEE FINISH MATERIAL KEY ON SHEET A107 FOR EXTERIOR METAL PANEL COLOR DESIGNATIONS.

REFER TO A500 ROOF PLAN FOR GUTTER SIZING, DOWNSPOUT SIZING AND SPLASHBLOCK/BOOT LOCATIONS. 4 REFER TO A107 FINISH SCHEDULE & DETAILS FOR FINISH MATERIAL KEY.

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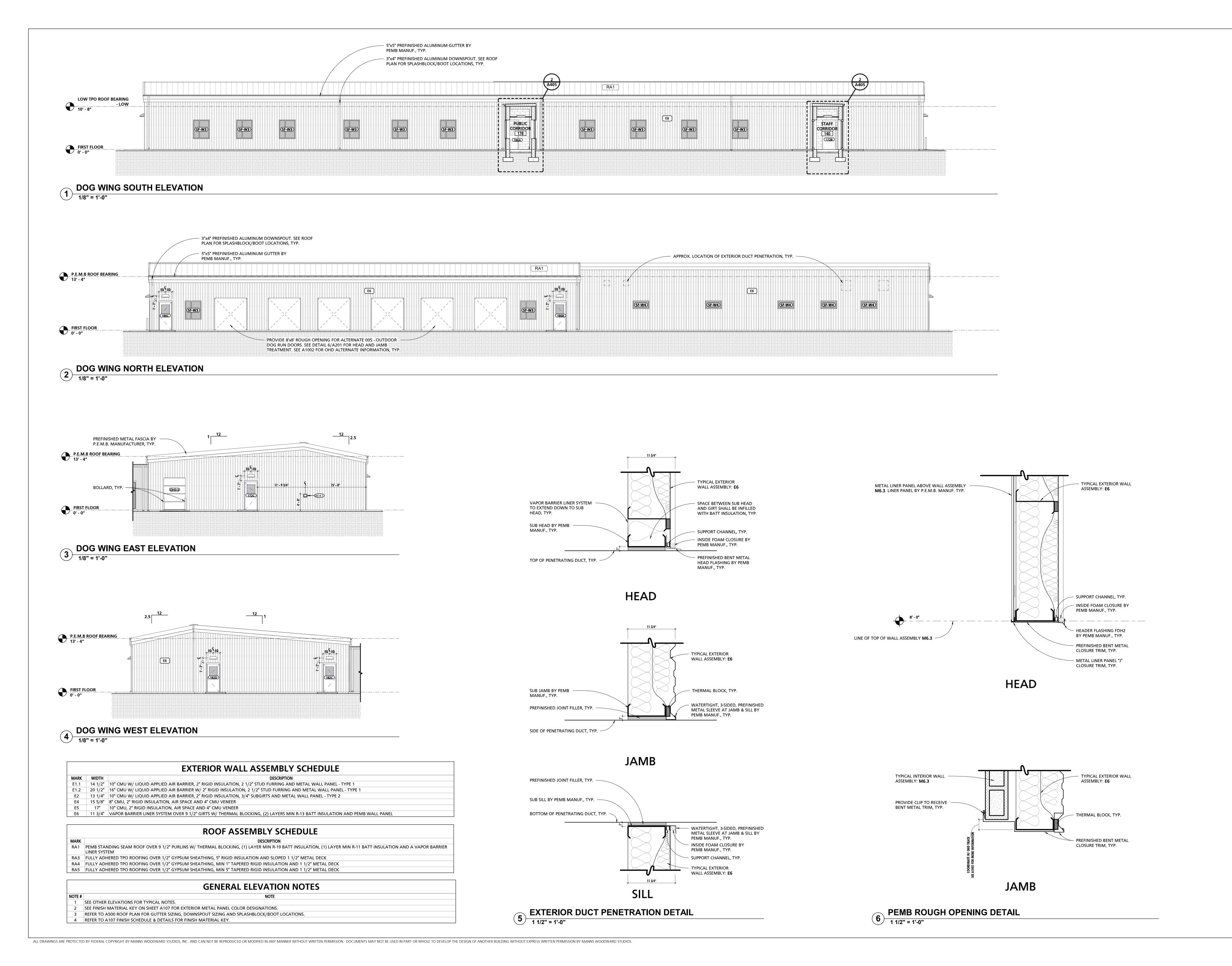


PROJECT NUMBER: PROJECT SET: PERMIT

NO. DESCRIPTION DATE

DATE ISSUED: 12/23/2019 DRAWING TITLE: **BUILDING ELEVATIONS**

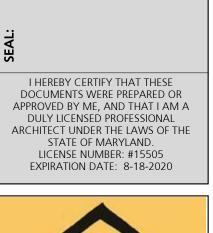
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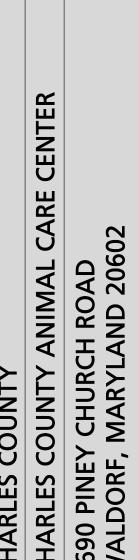
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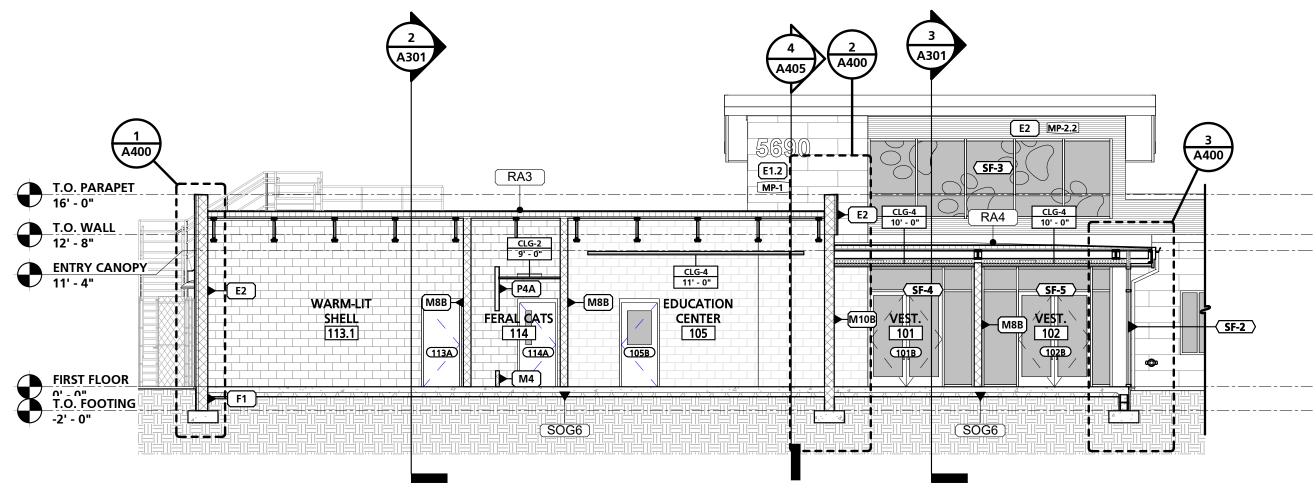
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12/23/2019 DRAWING TITLE:

BUILDING ELEVATIONS -DOG WING SHEET NUMBER:

1 TYPICAL BUILDING SECTION

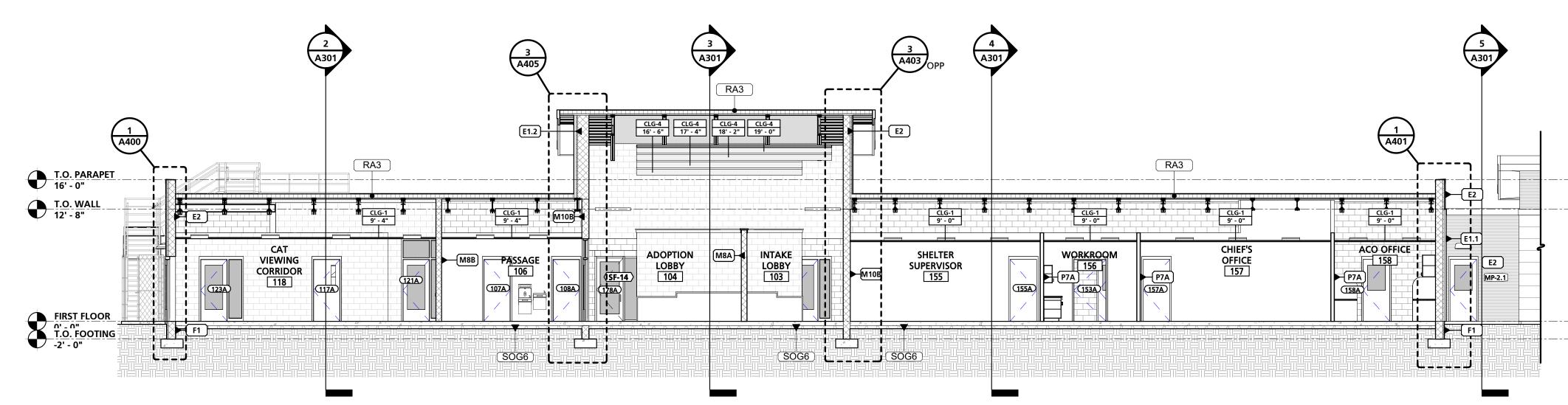
1/8" = 1'-0"



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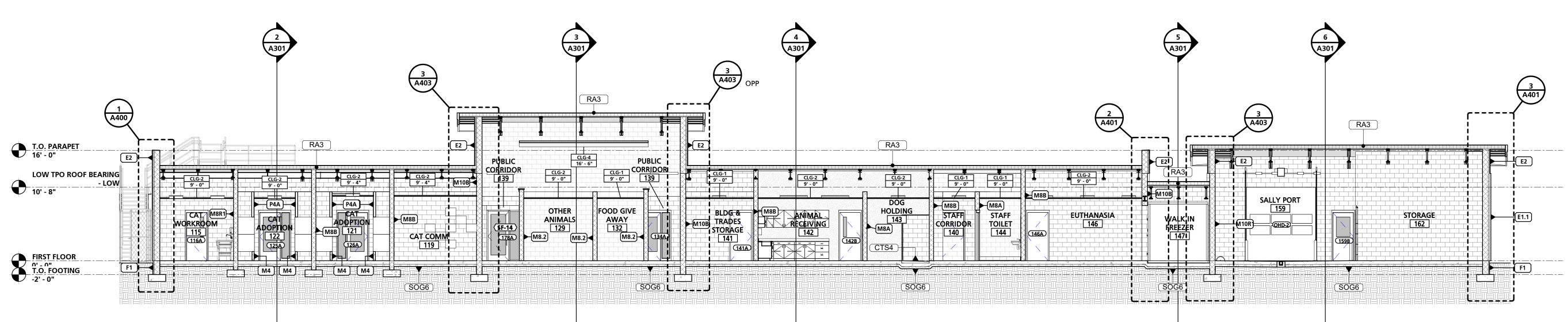
2 TYPICAL BUILDING SECTION

1/8" = 1'-0"



TYPICAL BUILDING SECTION

1/8" = 1'-0"



4 TYPICAL BUILDING SECTION

1/8" = 1'-0"

FOUNDATION WALL ASSEMBLY SCHEDULE

F1 11 5/8" 10" CMU W/ DAMPPROOFING, 2" RIGID INSULATION AND FIBERGLASS REINFORCED PLASTIC INSULATION PROTECTION WRAP F2 17 1/8" 6" CMU W/ DAMPPROOFING, 2" RIGID INSULATION, 1 7/8" AIR SPACE AND 8" CMU

EXTERIOR WALL ASSEMBLY SCHEDULE

E1.1 14 1/2" 10" CMU W/ LIQUID APPLIED AIR BARRIER, 2" RIGID INSULATION, 2 1/2" STUD FURRING AND METAL WALL PANEL - TYPE 1 E1.2 20 1/2" 16" CMU W/ LIQUID APPLIED AIR BARRIER W/ 2" RIGID INSULATION, 2 1/2" STUD FURRING AND METAL WALL PANEL - TYPE 1 E2 13 1/4" 10" CMU W/ LIQUID APPLIED AIR BARRIER, 2" RIGID INSULATION, 3/4" SUBGIRTS AND METAL WALL PANEL - TYPE 2

15 5/8" 8" CMU, 2" RIGID INSULATION, AIR SPACE AND 4" CMU VENEER 17" 10" CMU, 2" RIGID INSULATION, AIR SPACE AND 4" CMU VENEER

E6 11 3/4" VAPOR BARRIER LINER SYSTEM OVER 9 1/2" GIRTS W/ THERMAL BLOCKING, (2) LAYERS MIN R-13 BATT INSULATION AND PEMB WALL PANEL

			FIRE	RATING	
MARK	WIDTH	DESCRIPTION	RATING	ASSEMBLY REF	STC RATING
M4	3 5/8"	4" CMU - HEIGHT VARIES			
M4.3	3 5/8"	4" CMU TO EXTEND 8' - 0" A.F.F.			
M4A	3 5/8"	4" CMU TO EXTEND MIN. 6" ABOVE FINISH CEILING			
M6.1	5 5/8"	6" CMU TO EXTEND 5' - 4" A.F.F.			
M6.2	5 5/8"	6" CMU TO EXTEND 6' - 8" A.F.F.			
M6.3	5 5/8"	6" CMU TO EXTEND 8' - 0" A.F.F.			
M6A	5 5/8"	6" CMU TO EXTEND MIN. 6" ABOVE FINISH CEILING			
M8.1	7 5/8"	8" CMU TO EXTEND 6' - 8" A.F.F.			
M8.2	7 5/8"	8" CMU TO EXTEND 10' - 0" A.F.F.			
M8A	7 5/8"	8" CMU TO EXTEND MIN. 6" ABOVE FINISH CEILING			
M8B	7 5/8"	8" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE			
M8R1	7 5/8"	8" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE - 1 HR FIRE-RATED	1	UL-U906	
M10B	9 5/8"	10" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE			
M10R1	9 5/8"	10" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE - 1 HR FIRE-RATED	1	UL-U906	
M16B	15 5/8"	16" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE			
P4A	4 1/4"	3 5/8" METAL STUD W/ 5/8" GWB ONE SIDE TO EXTEND MIN. 6" ABOVE FINISH CEILING			
P7	4 7/8"	3-5/8" METAL STUD W/ 5/8" GYPSUM WALL BOARD EACH SIDE - HEIGHT VARIES			
P7A	4 7/8"	3-5/8" METAL STUD W/ 5/8" GYPSUM WALL BOARD EACH SIDE TO EXTEND MIN. 6" ABOVE FINISH CEILING			
P7B	4 7/8"	3-5/8" METAL STUD W/ 5/8" GYPSUM WALL BOARD EACH SIDE TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE			
P8A	7 1/4"	6" METAL STUD W/ 5/8" GYPSUM WALL BOARD EACH SIDE TO EXTEND MIN. 6" ABOVE FINISH CEILING			

	FLOOR ASSEMBLY SCHEDULE						
MARK	DESCRIPTION	COMMENTS					
CTS4	4" CONCRETE SLAB						
SOG6	6" CONCRETE SLAB OVER VAPOR BARRIER AND POROUS FILL						
SOG8	8" CONCRETE SLAB OVER VAPOR BARRIER AND POROUS FILL TYPICAL DOG WING SLAB						

	ROOF ASSEMBLY SCHEDULE
MA	RK DESCRIPTION
RA	PEMB STANDING SEAM ROOF OVER 9 1/2" PURLINS W/ THERMAL BLOCKING, (1) LAYER MIN R-19 BATT INSULATION, (1) LAYER MIN R-11 BATT INSULATION AND A VAPOR BARRIER LINER SYSTEM
RA	FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, 5" RIGID INSULATION AND SLOPED 1 1/2" METAL DECK

RA4 FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, MIN 1" TAPERED RIGID INSULATION AND 1 1/2" METAL DECK

GENERAL BUILDING SECTION NOTES NOTE
BUILDING SECTIONS ARE INTENDED TO SHOW OVERALL RELATIONSHIPS OF SPACES, OVERALL ASSEMBLIES, AND THE GEOMETRY OF THE BUILDING. SEE REFERENCED WALL SECTIONS AND DETAILS FOR ADDITIONAL INFORMATION.

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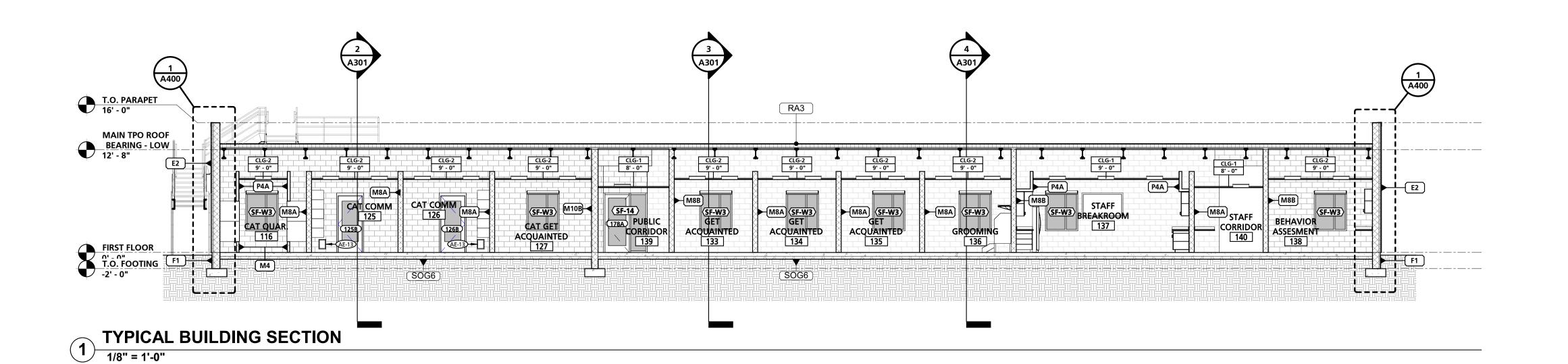


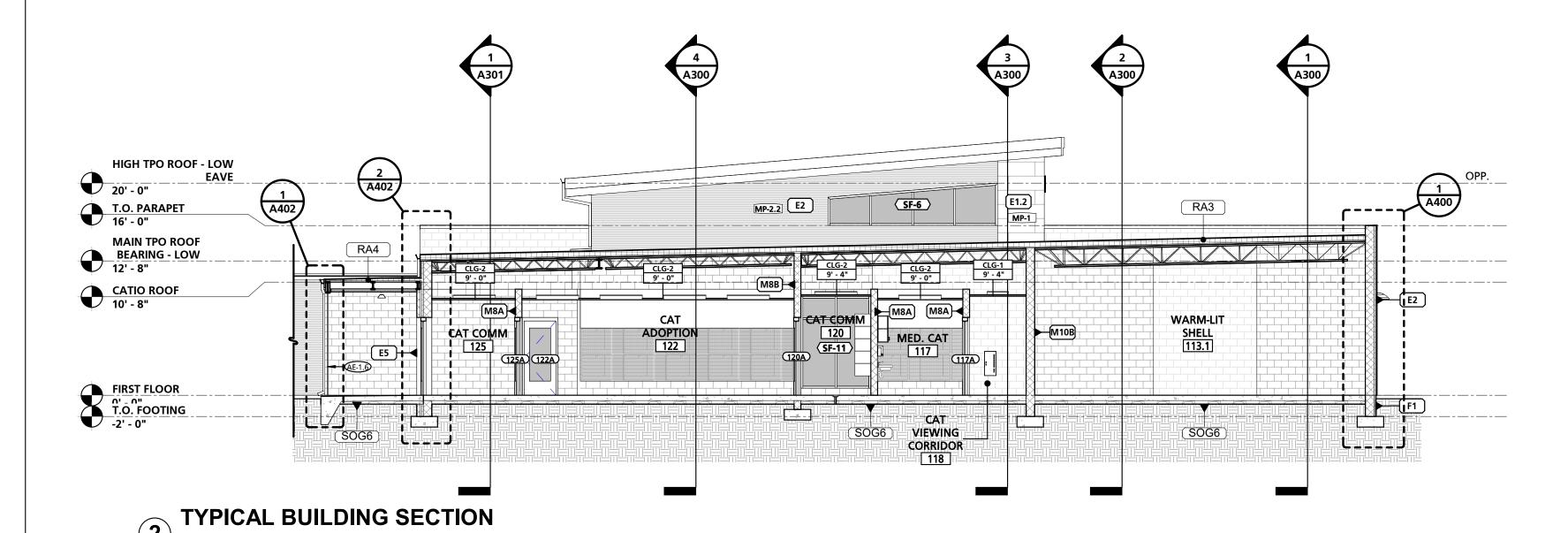
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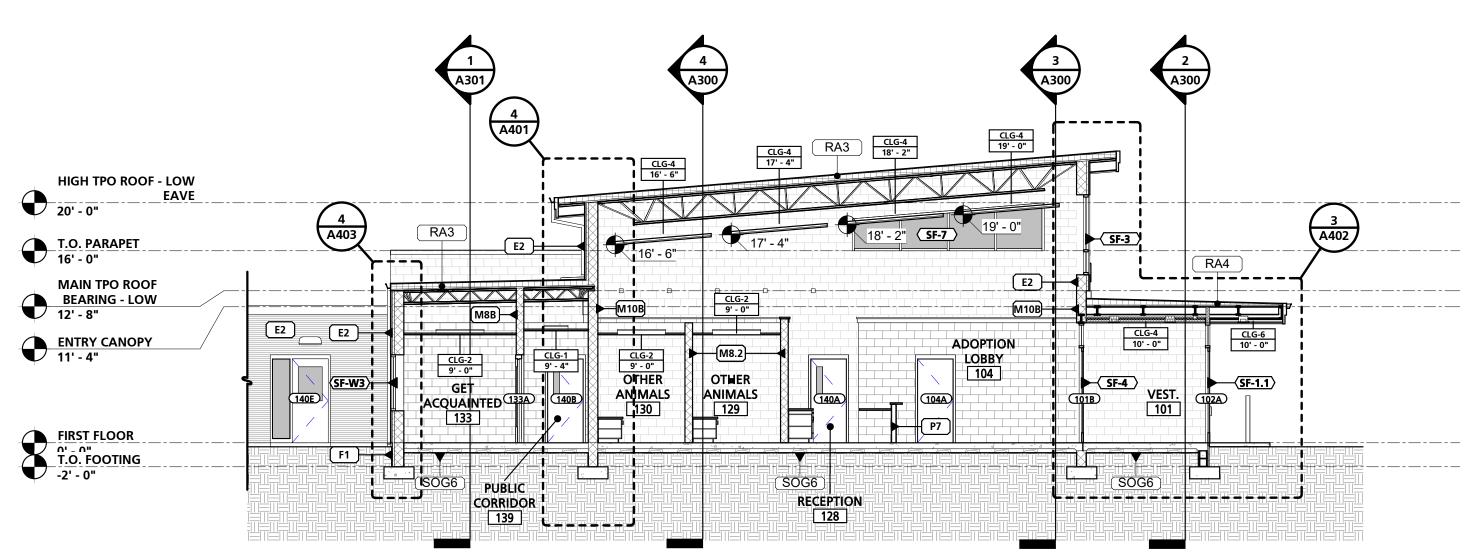
PROJECT NUMBER: PROJECT SET: PERMIT

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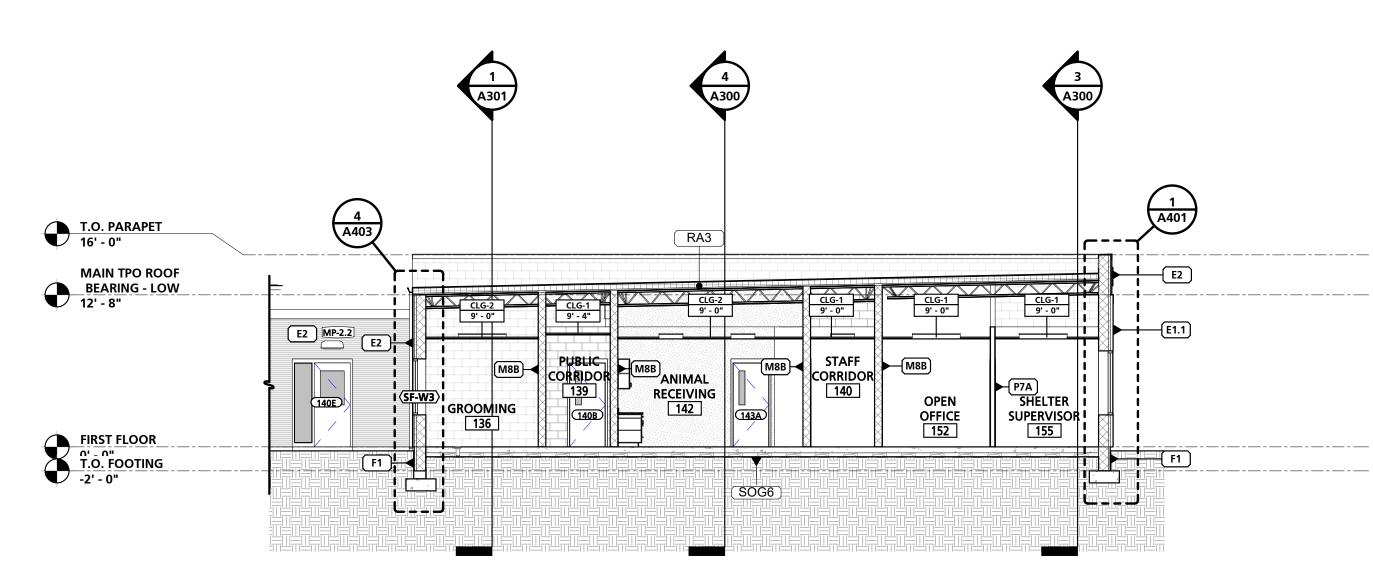
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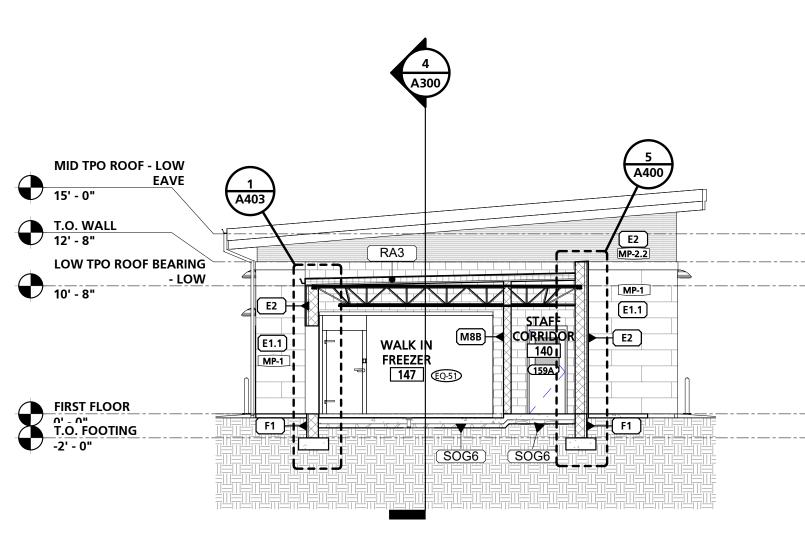


TYPICAL BUILDING SECTION 1/8" = 1'-0"



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5 TYPICAL BUILDING SECTION

1/8" = 1'-0"

FOUNDATION WALL ASSEMBLY SCHEDULE

MARK	WIDTH	DESCRIPTION
F1	11 5/8"	10" CMU W/ DAMPPROOFING, 2" RIGID INSULATION AND FIBERGLASS REINFORCED PLASTIC INSULATION PROTECTION WRAP
F2	17 1/8"	6" CMU W/ DAMPPROOFING, 2" RIGID INSULATION, 1 7/8" AIR SPACE AND 8" CMU

EXTERIOR WALL ASSEMBLY SCHEDULE

MARK	WIDTH	DESCRIPTION
E1.1	14 1/2"	10" CMU W/ LIQUID APPLIED AIR BARRIER, 2" RIGID INSULATION, 2 1/2" STUD FURRING AND METAL WALL PANEL - TYPE 1
E1.2	20 1/2"	16" CMU W/ LIQUID APPLIED AIR BARRIER W/ 2" RIGID INSULATION, 2 1/2" STUD FURRING AND METAL WALL PANEL - TYPE 1

15 5/8" 8" CMU, 2" RIGID INSULATION, AIR SPACE AND 4" CMU VENEER

17" 10" CMU, 2" RIGID INSULATION, AIR SPACE AND 4" CMU VENEER 11 3/4" VAPOR BARRIER LINER SYSTEM OVER 9 1/2" GIRTS W/ THERMAL BLOCKING, (2) LAYERS MIN R-13 BATT INSULATION AND PEMB WALL PANEL

			FIRE	RATING	
MARK	WIDTH	DESCRIPTION	RATING	ASSEMBLY REF	STC RATI
M4	3 5/8"	4" CMU - HEIGHT VARIES			
M4.3	3 5/8"	4" CMU TO EXTEND 8' - 0" A.F.F.			
M4A	3 5/8"	4" CMU TO EXTEND MIN. 6" ABOVE FINISH CEILING			
M6.1	5 5/8"	6" CMU TO EXTEND 5' - 4" A.F.F.			
M6.2	5 5/8"	6" CMU TO EXTEND 6' - 8" A.F.F.			
M6.3	5 5/8"	6" CMU TO EXTEND 8' - 0" A.F.F.			
M6A	5 5/8"	6" CMU TO EXTEND MIN. 6" ABOVE FINISH CEILING			
M8.1	7 5/8"	8" CMU TO EXTEND 6' - 8" A.F.F.			
M8.2	7 5/8"	8" CMU TO EXTEND 10' - 0" A.F.F.			
M8A	7 5/8"	8" CMU TO EXTEND MIN. 6" ABOVE FINISH CEILING			
M8B	7 5/8"	8" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE			
M8R1	7 5/8"	8" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE - 1 HR FIRE-RATED	1	UL-U906	
M10B	9 5/8"	10" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE			
M10R1	9 5/8"	10" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE - 1 HR FIRE-RATED	1	UL-U906	
M16B	15 5/8"	16" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE			
P4A	4 1/4"	3 5/8" METAL STUD W/ 5/8" GWB ONE SIDE TO EXTEND MIN. 6" ABOVE FINISH CEILING			
P7	4 7/8"	3-5/8" METAL STUD W/ 5/8" GYPSUM WALL BOARD EACH SIDE - HEIGHT VARIES			
P7A	4 7/8"	3-5/8" METAL STUD W/ 5/8" GYPSUM WALL BOARD EACH SIDE TO EXTEND MIN. 6" ABOVE FINISH CEILING			
P7B	4 7/8"	3-5/8" METAL STUD W/ 5/8" GYPSUM WALL BOARD EACH SIDE TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE			
P8A	7 1/4"	6" METAL STUD W/ 5/8" GYPSUM WALL BOARD EACH SIDE TO EXTEND MIN. 6" ABOVE FINISH CEILING			

	FLOOR ASSEMBLY SCHEDULE					
ARK	DESCRIPTION	COMMENTS				
rs4	4" CONCRETE SLAB					
G6	6" CONCRETE SLAB OVER VAPOR BARRIER AND POROUS FILL					
G8	8" CONCRETE SLAB OVER VAPOR BARRIER AND POROUS FILL	TYPICAL DOG WING SLAB				

ROOF ASSEMBLY SCHEDULE

MARK	DESCRIPTION
RA1	PEMB STANDING SEAM ROOF OVER 9 1/2" PURLINS W/ THERMAL BLOCKING, (1) LAYER MIN R-19 BATT INSULATION, (1) LAYER MIN R-11 BATT INSULATION AND A VAPOR BARRIE
	LINER SYSTEM

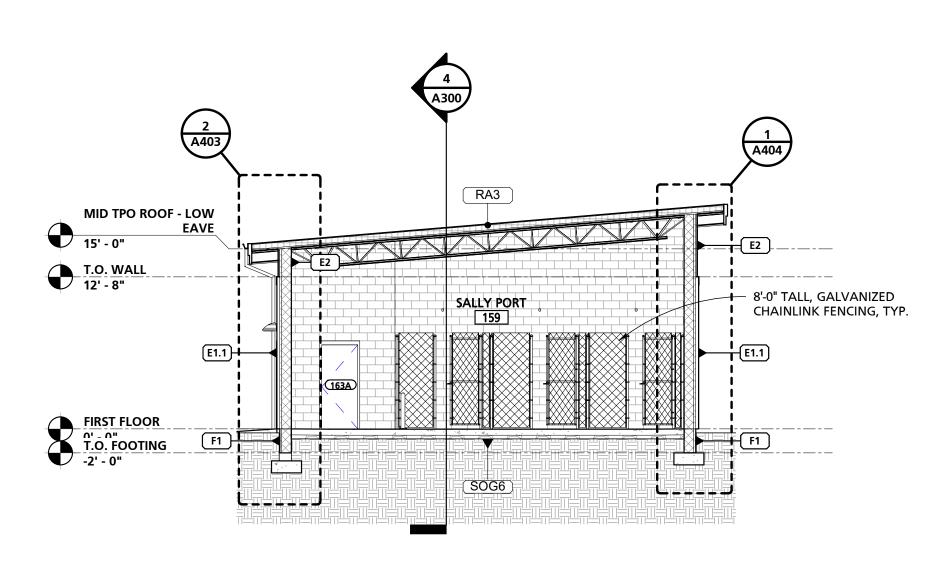
RA3 FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, 5" RIGID INSULATION AND SLOPED 1 1/2" METAL DECK

RA4 | FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, MIN 1" TAPERED RIGID INSULATION AND 1 1/2" METAL DECK

GENERAL BUILDING SECTION NOTES

NOTE

BUILDING SECTIONS ARE INTENDED TO SHOW OVERALL RELATIONSHIPS OF SPACES, OVERALL ASSEMBLIES, AND THE GEOMETRY OF THE BUILDING. SEE REFERENCED WALL SECTIONS AND DETAILS FOR ADDITIONAL INFORMATION.



6 TYPICAL BUILDING SECTION

1/8" = 1'-0"

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NO. DESCRIPTION DATE

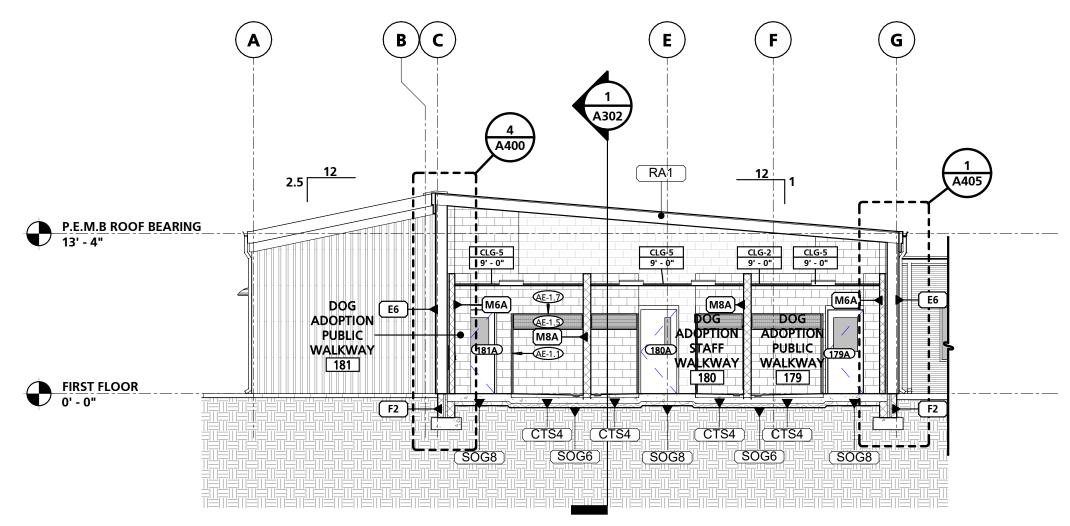
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12/23/2019 DRAWING TITLE: **BUILDING SECTIONS -**MAIN WING SHEET NUMBER:

A301

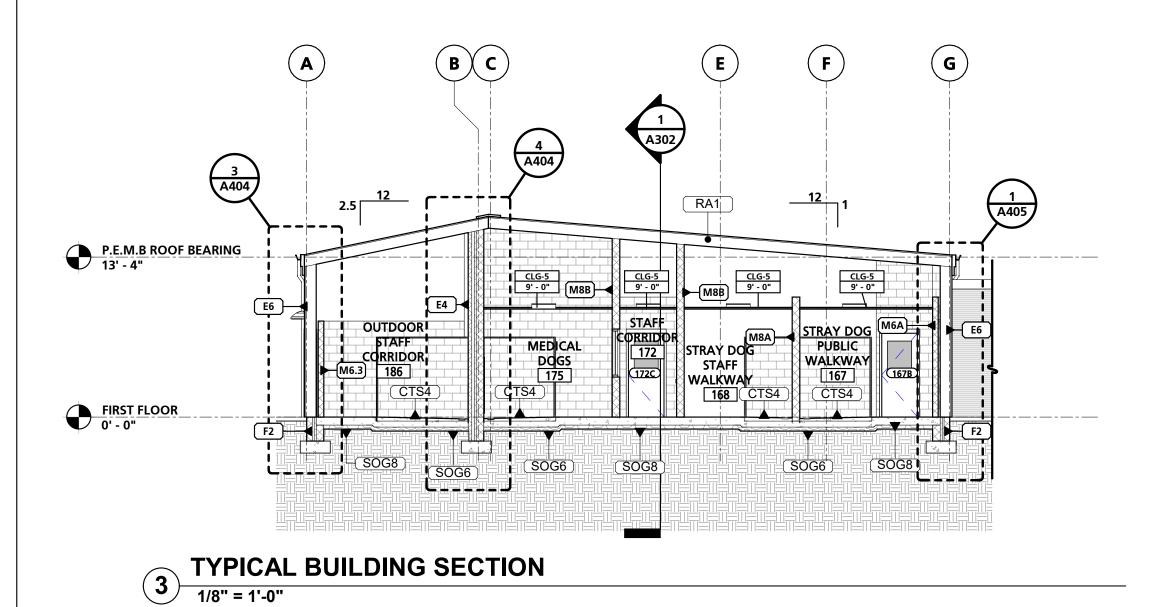
1 TYPICAL BUILDING SECTION

1/8" = 1'-0"



2 TYPICAL BUILDING SECTION

1/8" = 1'-0"



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FOUNDATION WALL ASSEMBLY SCHEDULE

F1 11 5/8" 10" CMU W/ DAMPPROOFING, 2" RIGID INSULATION AND FIBERGLASS REINFORCED PLASTIC INSULATION PROTECTION WRAP
F2 17 1/8" 6" CMU W/ DAMPPROOFING, 2" RIGID INSULATION, 1 7/8" AIR SPACE AND 8" CMU

EXTERIOR WALL ASSEMBLY SCHEDULE MARK WIDTH DESCRIPTION E1.1 14 1/2" 10" CMU W/ LIQUID APPLIED AIR BARRIER, 2" RIGID INSULATION, 2 1/2" STUD FURRING AND METAL WALL PANEL - TYPE 1 E1.2 20 1/2" 16" CMU W/ LIQUID APPLIED AIR BARRIER W/ 2" RIGID INSULATION, 2 1/2" STUD FURRING AND METAL WALL PANEL - TYPE 1 E2 13 1/4" 10" CMU W/ LIQUID APPLIED AIR BARRIER, 2" RIGID INSULATION, 3/4" SUBGIRTS AND METAL WALL PANEL - TYPE 2 E4 15 5/8" 8" CMU, 2" RIGID INSULATION, AIR SPACE AND 4" CMU VENEER E5 17" 10" CMU, 2" RIGID INSULATION, AIR SPACE AND 4" CMU VENEER E6 11 3/4" VAPOR BARRIER LINER SYSTEM OVER 9 1/2" GIRTS W/ THERMAL BLOCKING, (2) LAYERS MIN R-13 BATT INSULATION AND PEMB WALL PANEL

		INTERIOR WALL ASSEMBLY SCHEDULE			
			FIRE	RATING	
MARK	WIDTH	DESCRIPTION	RATING	ASSEMBLY REF	STC RATING
M4	3 5/8"	4" CMU - HEIGHT VARIES			
M4.3	3 5/8"	4" CMU TO EXTEND 8' - 0" A.F.F.			
M4A	3 5/8"	4" CMU TO EXTEND MIN. 6" ABOVE FINISH CEILING			
M6.1	5 5/8"	6" CMU TO EXTEND 5' - 4" A.F.F.			
M6.2	5 5/8"	6" CMU TO EXTEND 6' - 8" A.F.F.			
M6.3	5 5/8"	6" CMU TO EXTEND 8' - 0" A.F.F.			
M6A	5 5/8"	6" CMU TO EXTEND MIN. 6" ABOVE FINISH CEILING			
M8.1	7 5/8"	8" CMU TO EXTEND 6' - 8" A.F.F.			
M8.2	7 5/8"	8" CMU TO EXTEND 10' - 0" A.F.F.			
M8A	7 5/8"	8" CMU TO EXTEND MIN. 6" ABOVE FINISH CEILING			
M8B	7 5/8"	8" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE			
M8R1	7 5/8"	8" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE - 1 HR FIRE-RATED	1	UL-U906	
M10B	9 5/8"	10" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE			
M10R1	9 5/8"	10" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE - 1 HR FIRE-RATED	1	UL-U906	
M16B	15 5/8"	16" CMU TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE			
P4A	4 1/4"	3 5/8" METAL STUD W/ 5/8" GWB ONE SIDE TO EXTEND MIN. 6" ABOVE FINISH CEILING			
P7	4 7/8"	3-5/8" METAL STUD W/ 5/8" GYPSUM WALL BOARD EACH SIDE - HEIGHT VARIES			
P7A	4 7/8"	3-5/8" METAL STUD W/ 5/8" GYPSUM WALL BOARD EACH SIDE TO EXTEND MIN. 6" ABOVE FINISH CEILING			
P7B	4 7/8"	3-5/8" METAL STUD W/ 5/8" GYPSUM WALL BOARD EACH SIDE TO EXTEND TO UNDERSIDE OF STRUCTURE ABOVE			
P8A	7 1/4"	6" METAL STUD W/ 5/8" GYPSUM WALL BOARD EACH SIDE TO EXTEND MIN. 6" ABOVE FINISH CEILING			

	FLOOR ASSEMBLY SCHEDULE						
MARK	DESCRIPTION	COMMENTS					
CTS4	4" CONCRETE SLAB						
SOG6	6" CONCRETE SLAB OVER VAPOR BARRIER AND POROUS FILL						
SOG8	8" CONCRETE SLAB OVER VAPOR BARRIER AND POROUS FILL	TYPICAL DOG WING SLAB					

	ROOF ASSEMBLY SCHEDULE					
MARK	DESCRIPTION					
RA1	PEMB STANDING SEAM ROOF OVER 9 1/2" PURLINS W/ THERMAL BLOCKING, (1) LAYER MIN R-19 BATT INSULATION, (1) LAYER MIN R-11 BATT INSULATION AND A VAPOR BARRIER LINER SYSTEM					
RA3	FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, 5" RIGID INSULATION AND SLOPED 1 1/2" METAL DECK					
RA4	FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, MIN 1" TAPERED RIGID INSULATION AND 1 1/2" METAL DECK					

RA5 FULLY ADHERED TPO ROOFING OVER 1/2" GYPSUM SHEATHING, MIN 5" TAPERED RIGID INSULATION AND 1 1/2" METAL DECK

GENERAL BUILDING SECTION NOTES

BUILDING SECTIONS ARE INTENDED TO SHOW OVERALL RELATIONSHIPS OF SPACES, OVERALL ASSEMBLIES, AND THE GEOMETRY OF THE BUILDING. SEE REFERENCED WALL SECTIONS AND DETAILS FOR ADDITIONAL INFORMATION.



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(F) 443-403-2460

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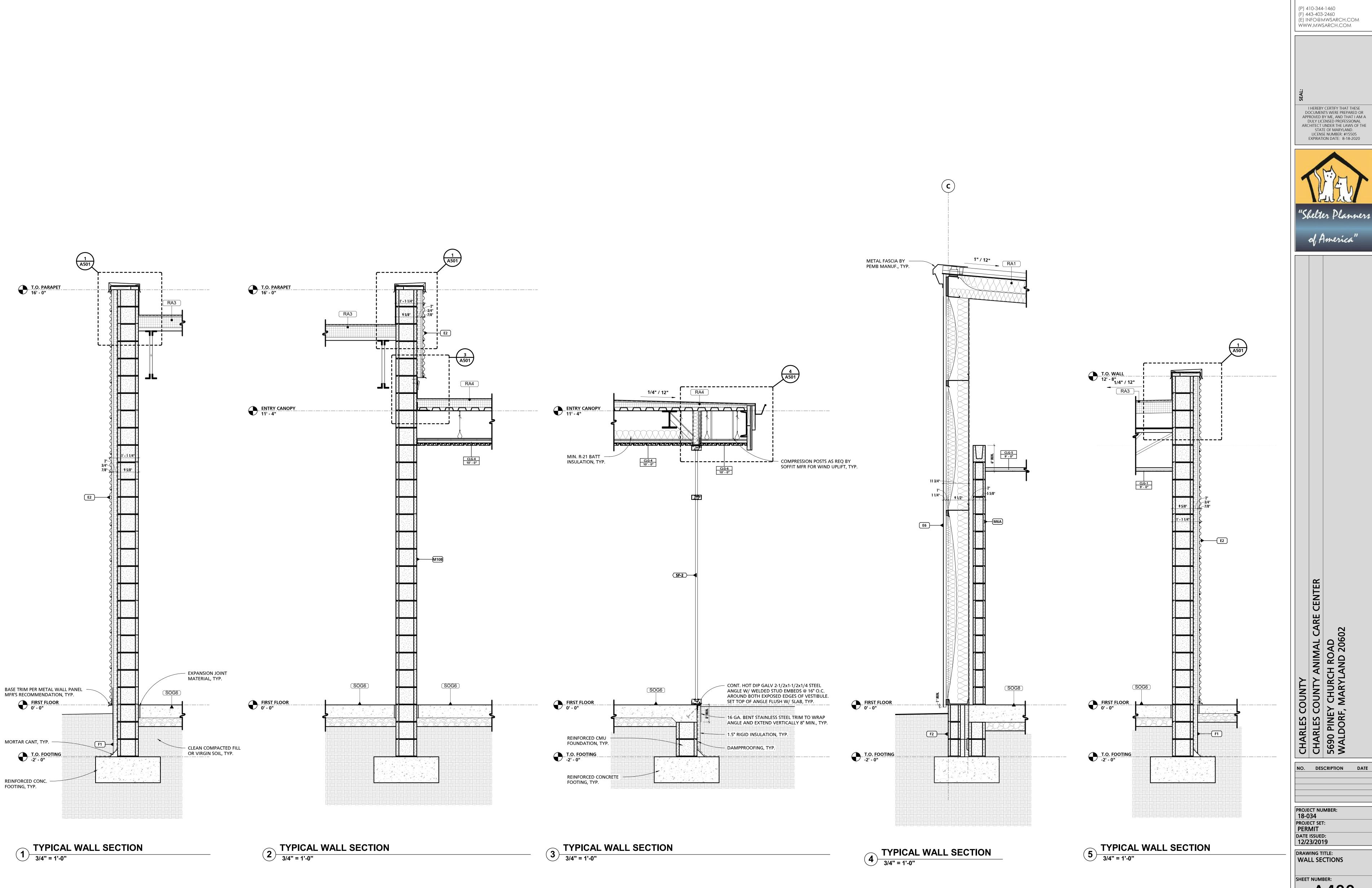


CHARLES COUNTY
CHARLES COUNTY ANIMAL CARE CENT
5690 PINEY CHURCH ROAD
WALDORF, MARYLAND 20602

NO. DESCRIPTION DATE

PROJECT NUMBER:
18-034
PROJECT SET:
PERMIT
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12/23/2019

DRAWING TITLE:
BUILDING SECTIONS DOG WING



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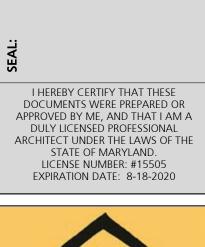
GENERAL WALL SECTION NOTES

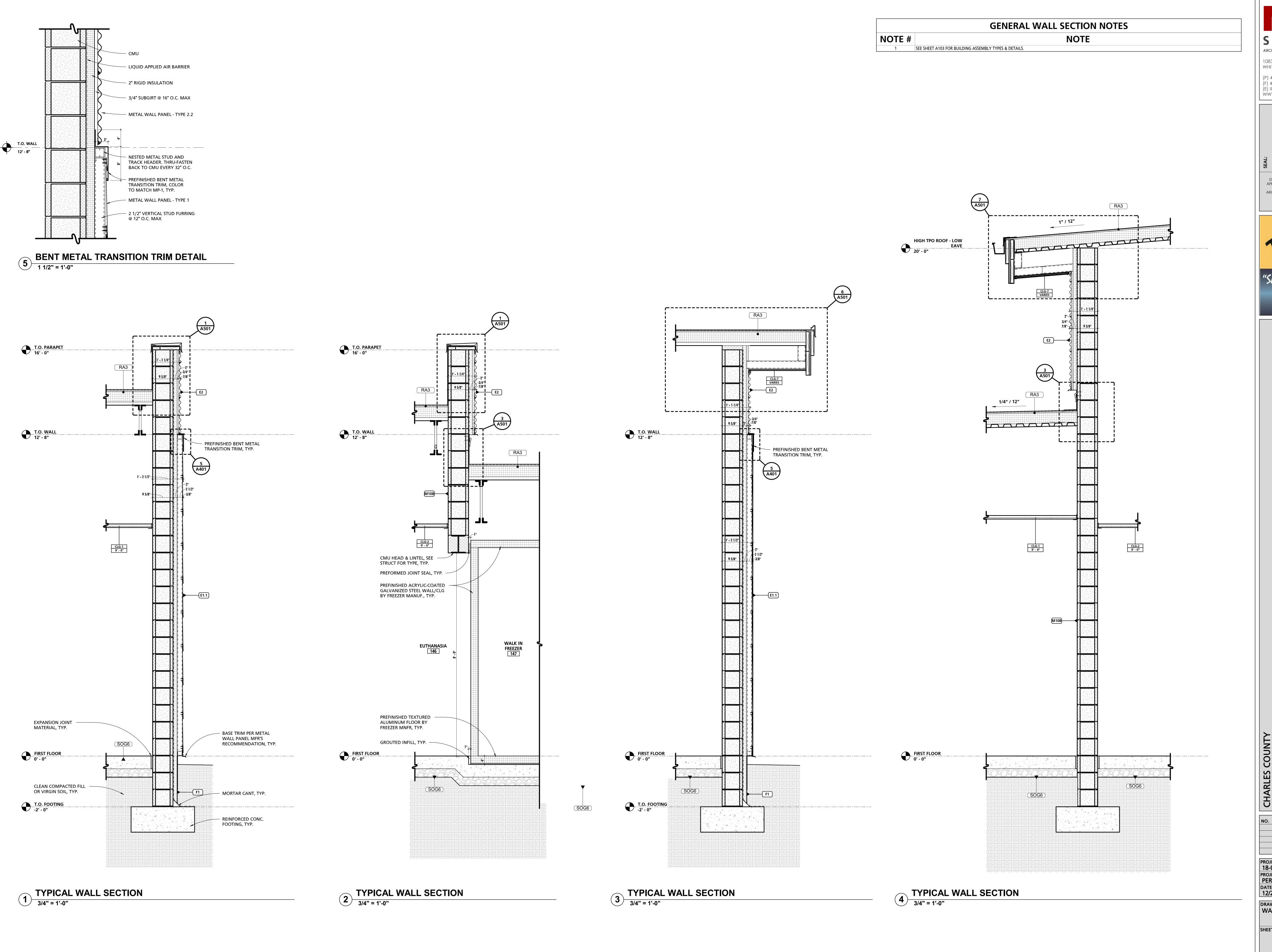
NOTE

NOTE #

SEE SHEET A103 FOR BUILDING ASSEMBLY TYPES & DETAILS.

ARCHITECTURE + MASTER PLANNING





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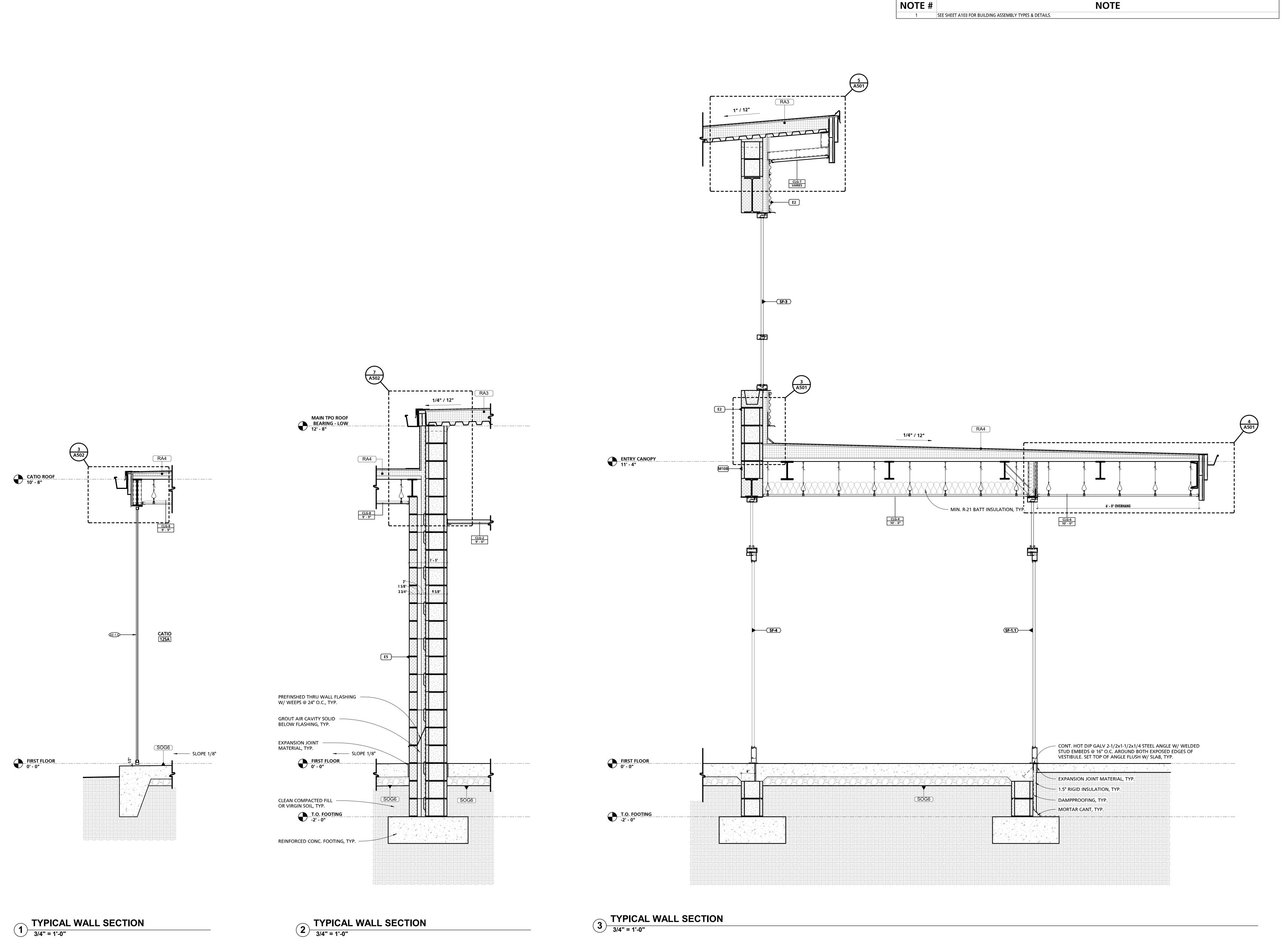
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NO. DESCRIPTION DATE

PROJECT NUMBER: 18-034 PROJECT SET: PERMIT

DATE ISSUED: 12/23/2019 DRAWING TITLE: WALL SECTIONS



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GENERAL WALL SECTION NOTES

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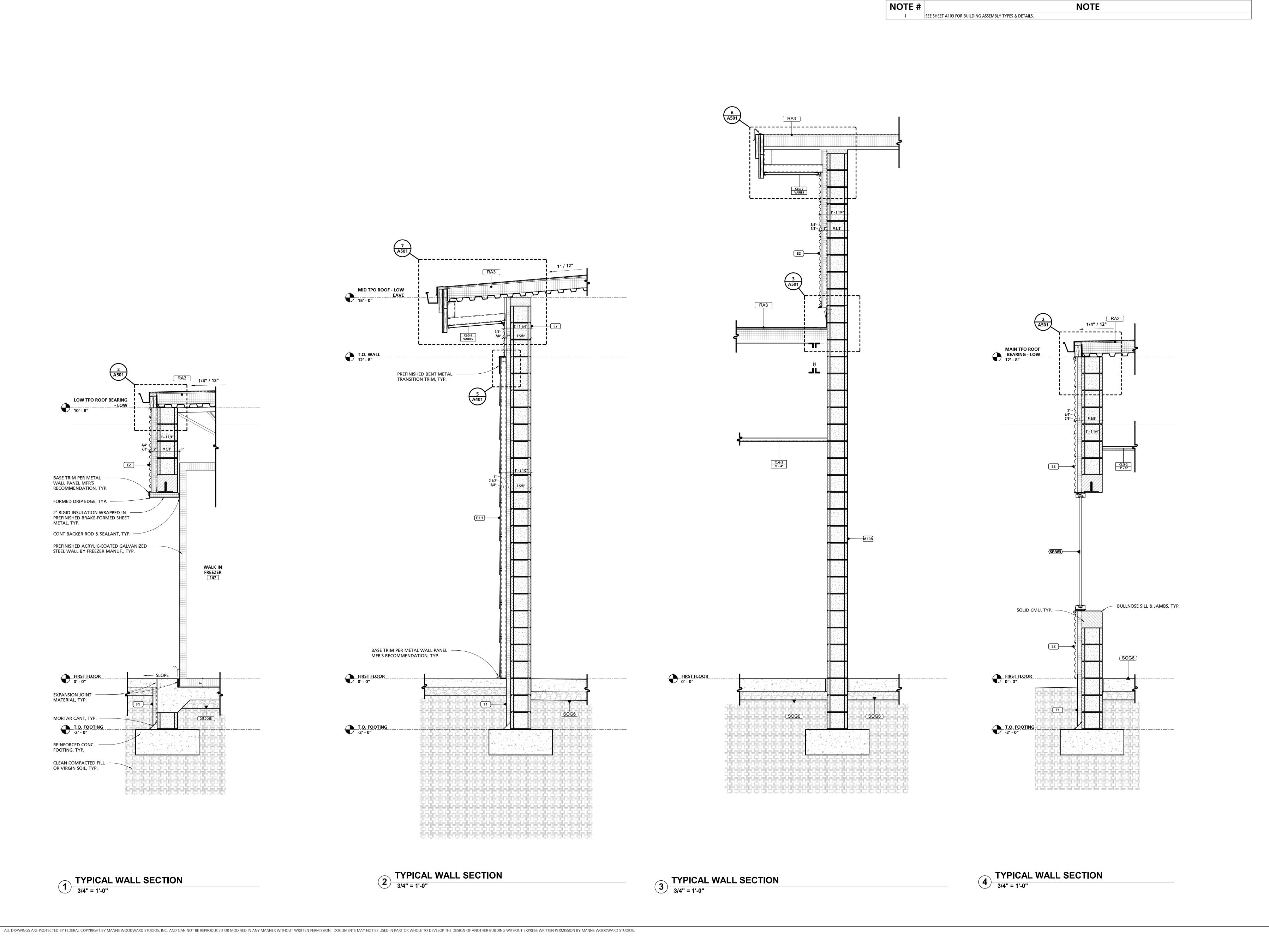
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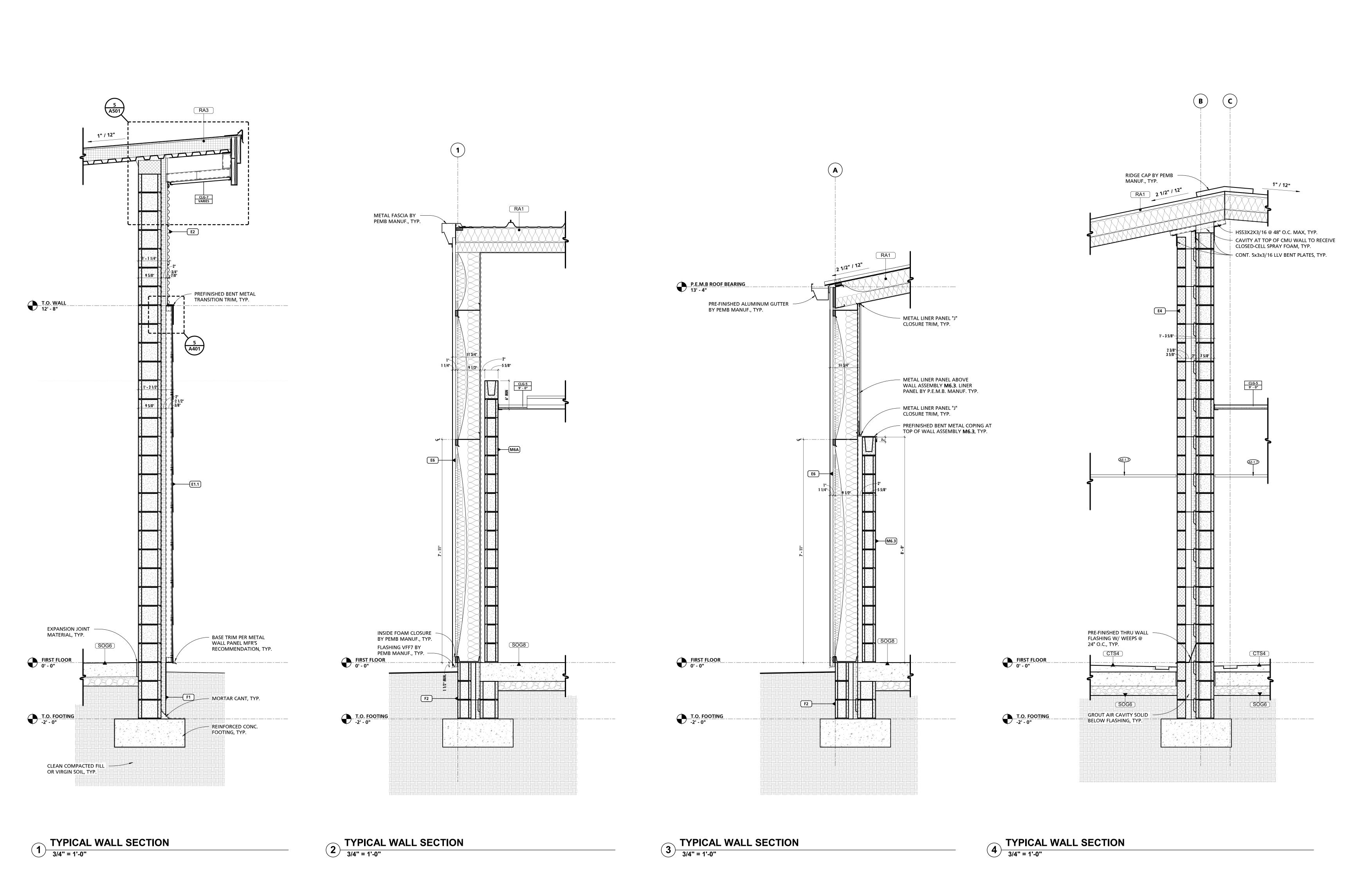
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GENERAL WALL SECTION NOTES

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GENERAL WALL SECTION NOTES NOTE SEE SHEET A103 FOR BUILDING ASSEMBLY TYPES & DETAILS.

NOTE #



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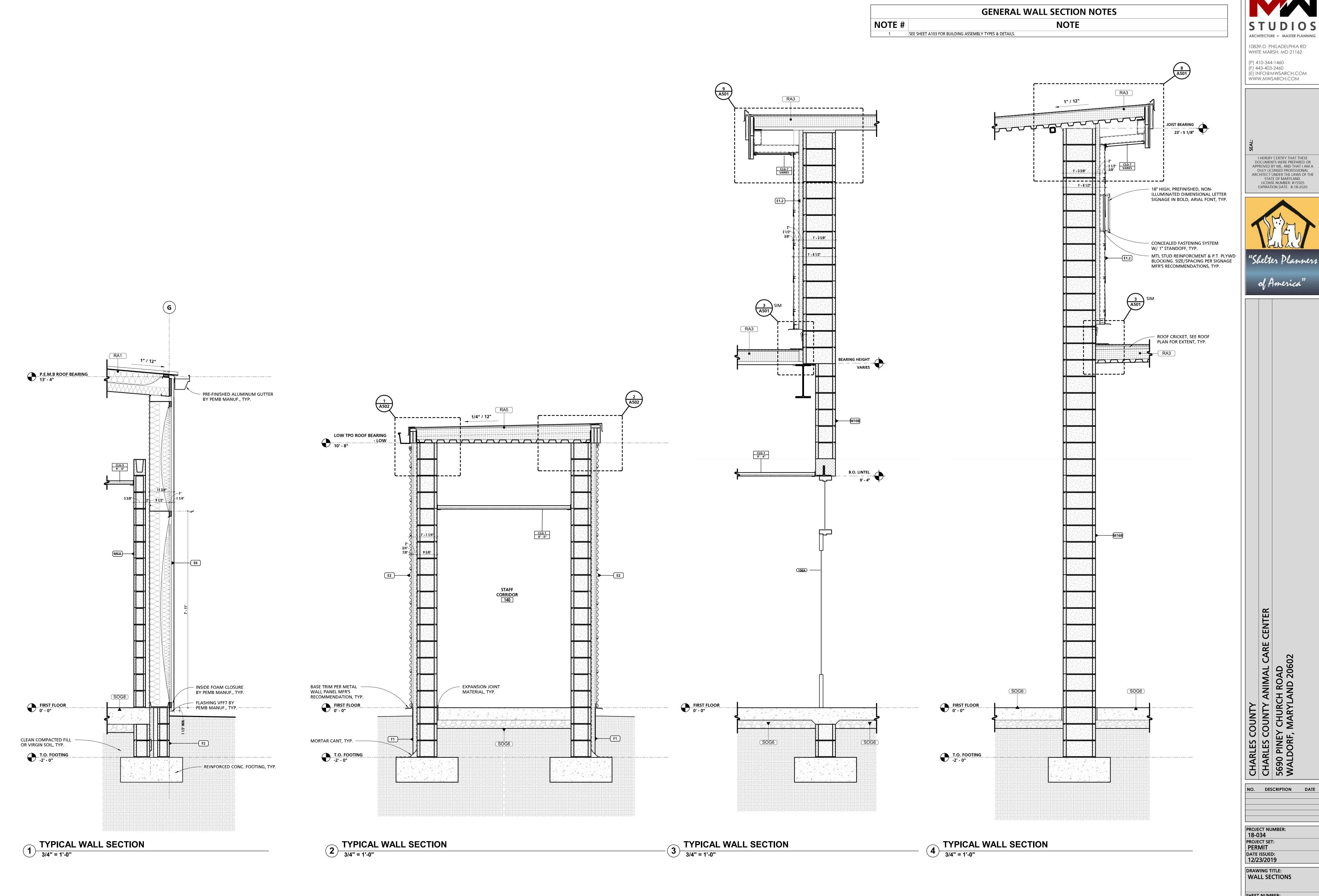
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DATE ISSUED: 12/23/2019

DRAWING TITLE: WALL SECTIONS

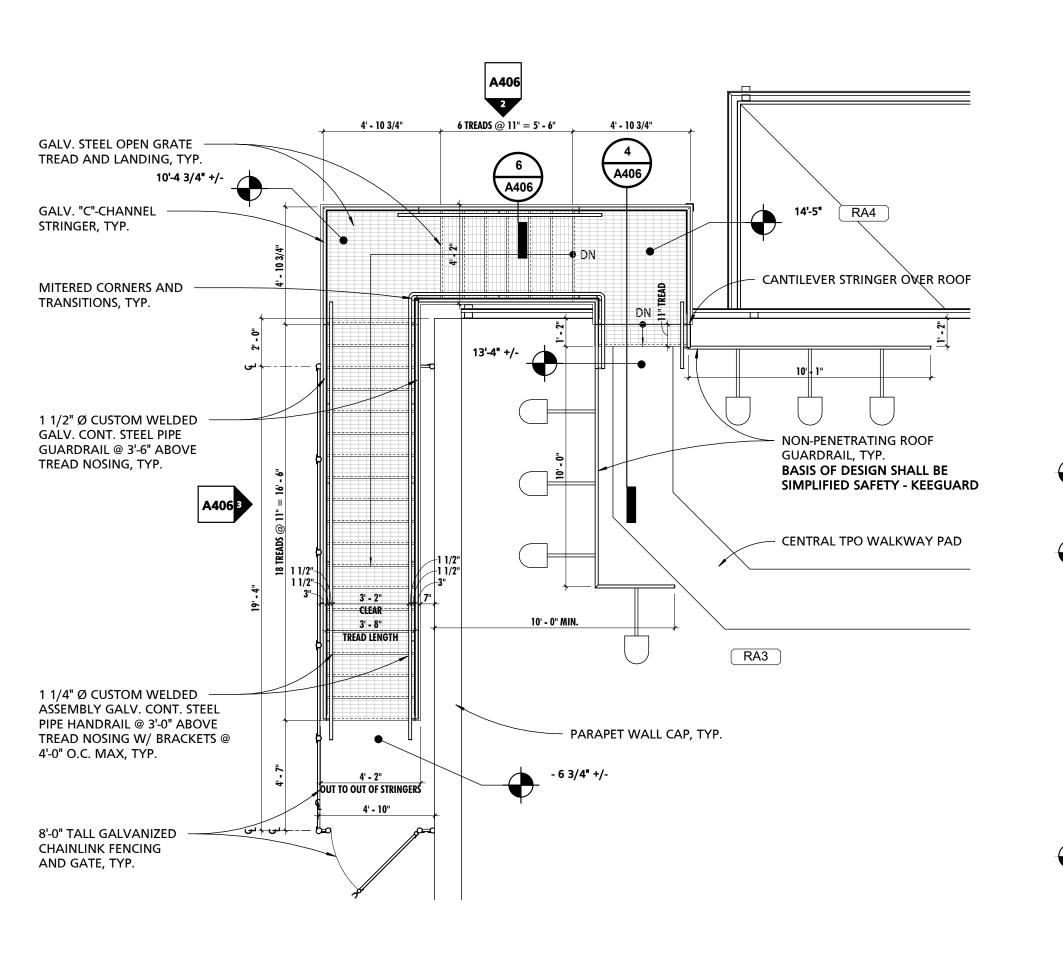
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A404



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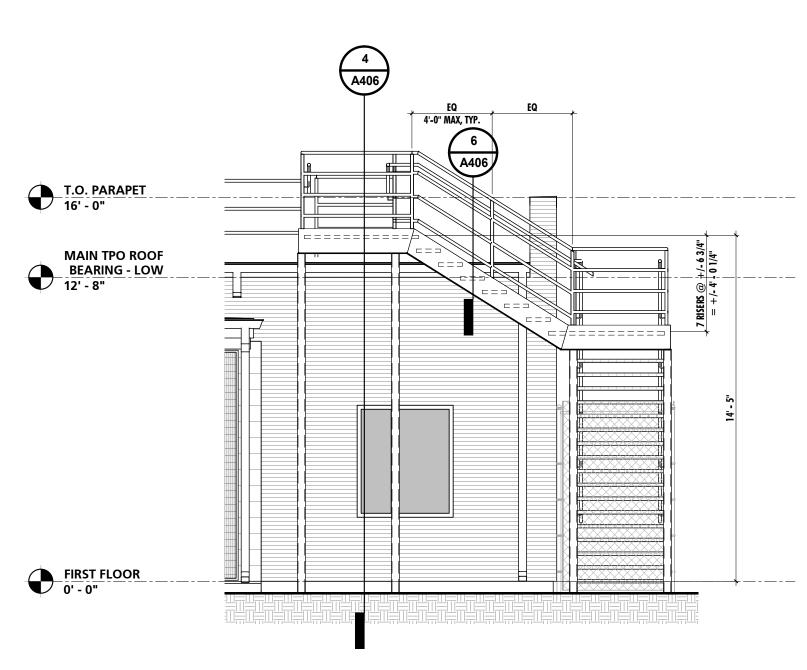
DATE ISSUED: 12/23/2019 DRAWING TITLE: WALL SECTIONS



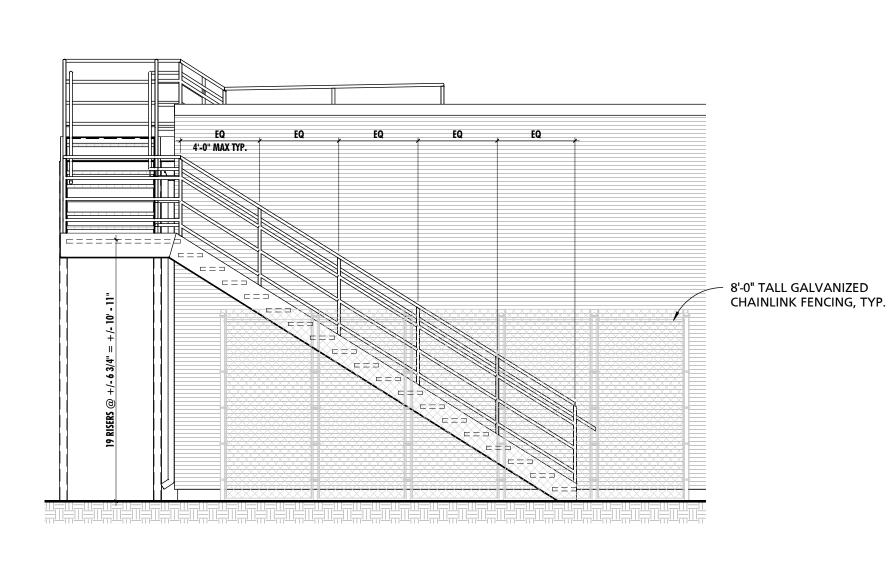
EXTERIOR ROOF ACCESS STAIR

TYPICAL TREAD DETAIL

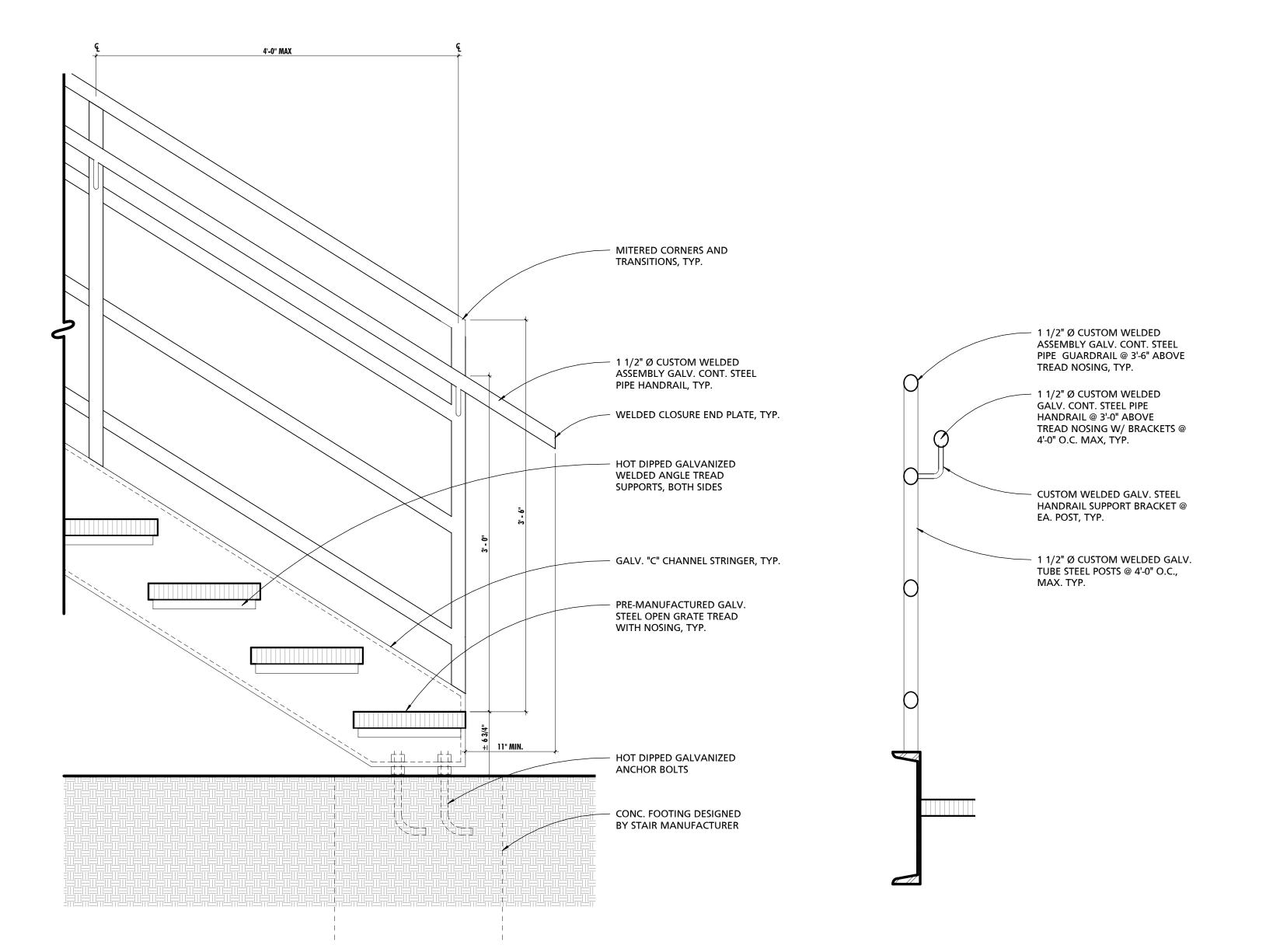
1 1/2" = 4' 0"



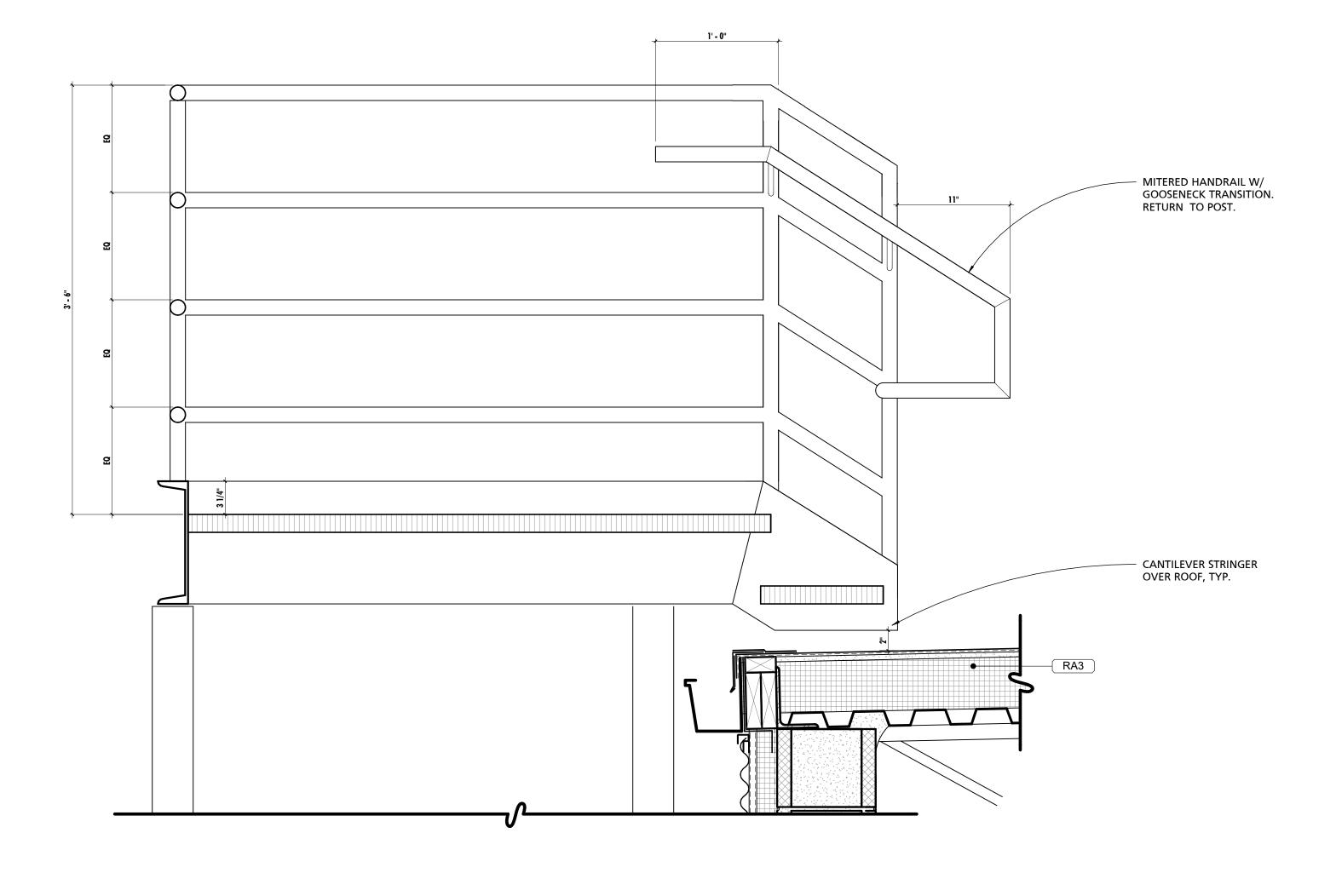
2 EXTERIOR STAIR - NORTH
1/4" = 1'-0"







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6 TYPICAL RAILING DETAIL
1 1/2" = 1'-0"

4 STAIR SECTION AT ROOF
1 1/2" = 1'-0"

STUDIOS

ARCHITECTURE + MASTER PLANNING

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GENERAL STAIR & RAILING NOTES

1 DELEGATED DESIGN: GENERAL CONTRACTOR SHALL RETAIN A STRUCTURAL ENGINEER REGISTER IN THE STATE OF MARYLAND TO

COMPLETE THE STRUCTURAL ENGINEERING DESIGN OF THE STAIRS, HANDRAILS, GUARDS, FOOTINGS, AND ALL ASSOCIATED

DESIGN INTENT, GENERAL: BOTH STAIR, HANDRAILS, AND GUARD/RAILS SHALL BE FABRICATED TO MEET THE DESIGN INTENT

DE-BURR, GRIND WELDS SMOOTH, AND FILL. PROTECT ADJACENT SURFACES FROM WELDING SPATTER, TYPICAL ALL WELDS.

FIELD-CUT AND FIELD-WELD ONLY WHERE IMPOSSIBLE TO COMPLETE IN SHOP. IMMEDIATELY STRIPE-PAINT ALL FIELD CUTS AND

STRUCTURAL CONNECTIONS OF POSTS TO FRAMING SHALL BE DESIGNED BY GUARD RAIL SYSTEM MANUFACTURER.

STAIRS: GALVANIZED STEEL OPEN GRATE TREAD FULLY WELDED TO GALVANIZED STEEL "C" CHANNEL STRINGER.

SHOP-FABRICATE AND SHOP-WELD TO GREATEST EXTENT FEASIBLE. HOT DIP GALVANIZE AFTER FABRICATION.

ENGINEERING CALCULATIONS AS PART OF THE SUBMITTAL PROCESS.

INDICATED IN THESE DRAWINGS.

WELDS WITH GALVANIZING REPAIR PAINT.

CONNECTIONS TO MEET THE APPLICABLE BUILDING CODE REQUIREMENTS. GC SHALL SUBMIT SIGNED AND SEALED STRUCTURAL

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Shelter Planners of America"

HARLES COUNTY ANIMAL CARE CENTERS 690 PINEY CHURCH ROAD WALDORF, MARYLAND 20602

PROJECT NUMBER:
18-034
PROJECT SET:
PERMIT

NO. DESCRIPTION DATE

DATE ISSUED:
12/23/2019

DRAWING TITLE:
EXTERIOR STAIR DETAILS



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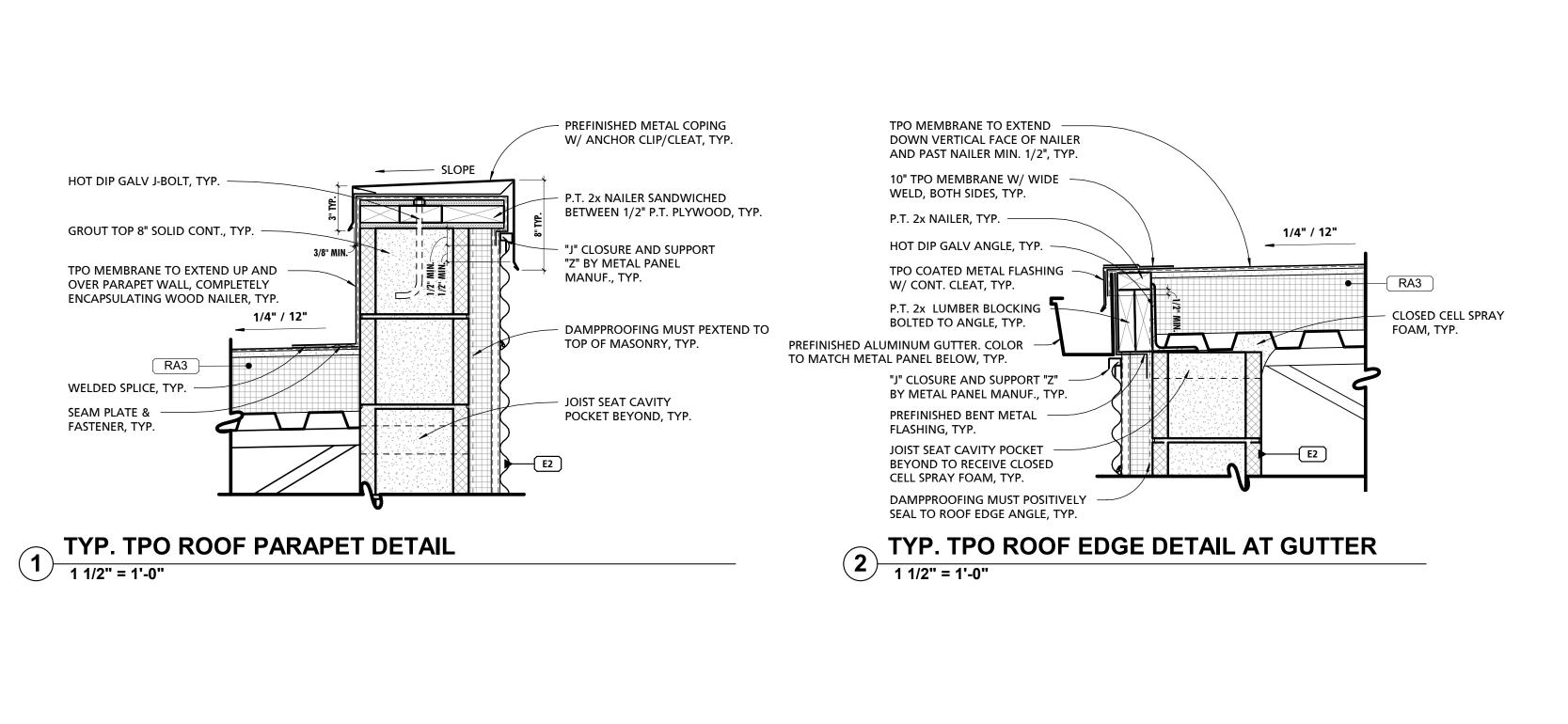
of America"

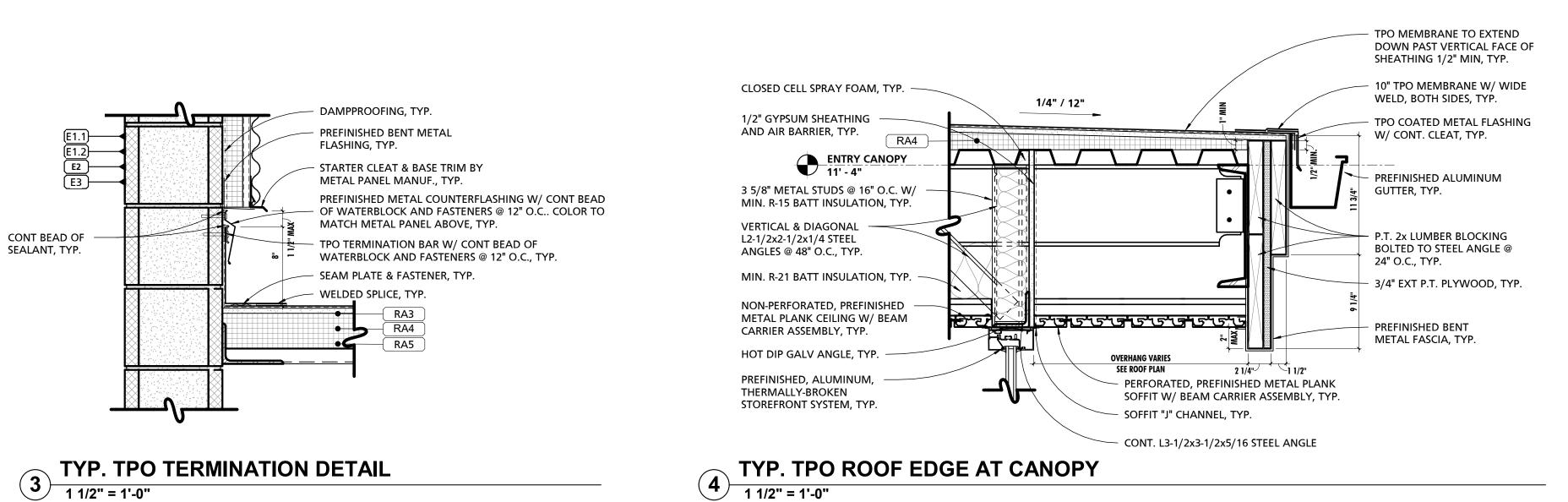
CHARLES COUNTY ANIMAL CARE CEI 5690 PINEY CHURCH ROAD WALDORF, MARYLAND 20602

NO. DESCRIPTION DATE

PROJECT NUME 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE:







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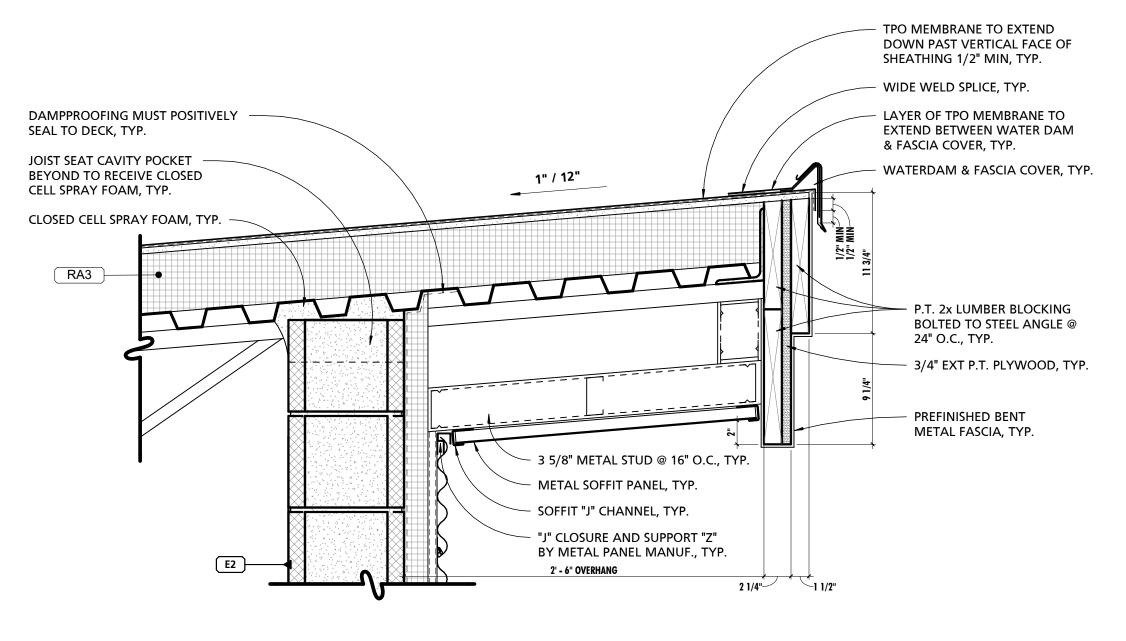
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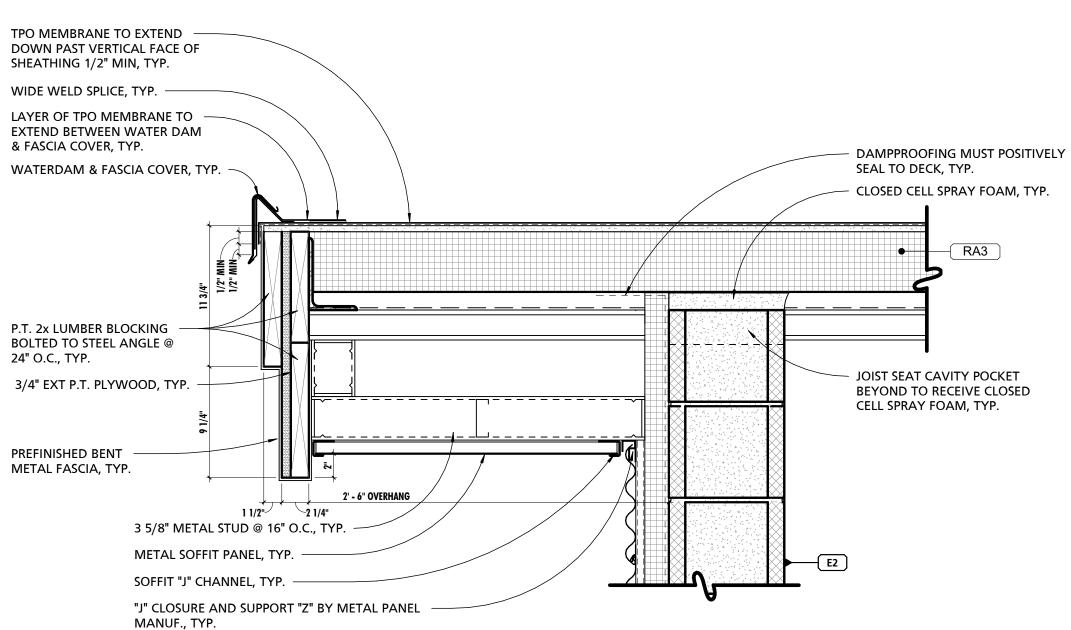
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STEEL LOOKOUT, TYP.

SEAL TO DECK, TYP.

DAMPPROOFING MUST POSITIVELY

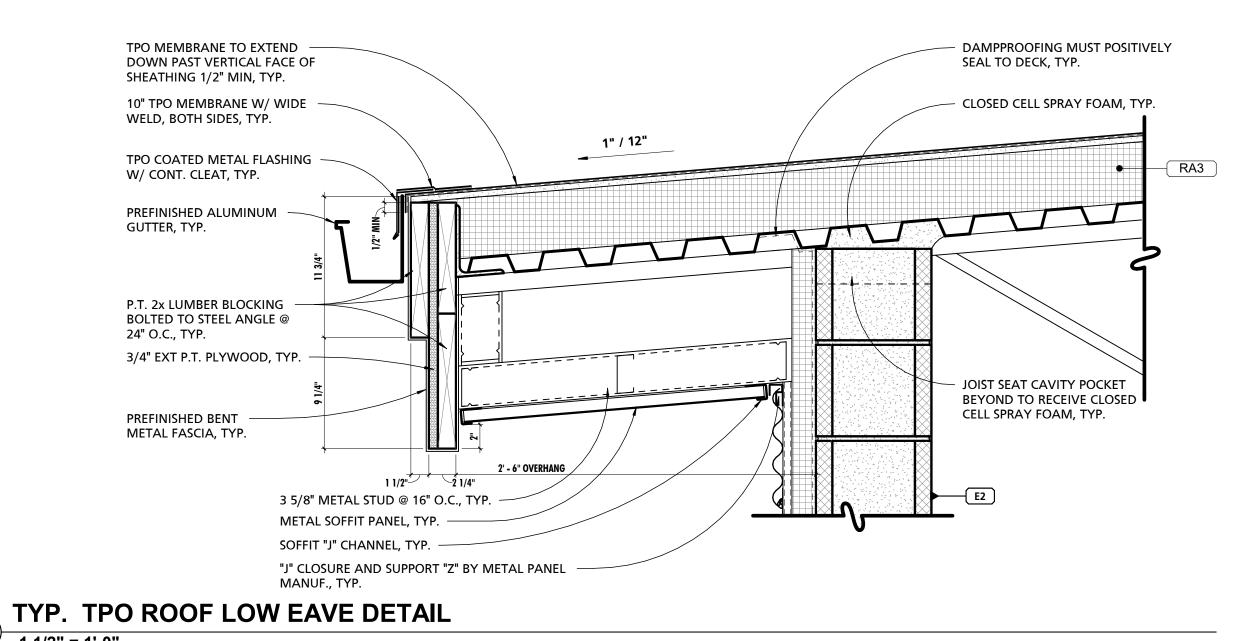
RA3

- CLOSED CELL SPRAY FOAM, TYP.

JOIST SEAT CAVITY POCKET

CELL SPRAY FOAM, TYP.

BEYOND TO RECEIVE CLOSED



TYP. TPO ROOF HIGH EAVE DETAIL AT WALL TYPE E2

TYP. TPO ROOF HIGH EAVE DETAIL AT WALL TYPE E1.2



TPO MEMBRANE TO EXTEND

SHEATHING 1/2" MIN, TYP.

& FASCIA COVER, TYP.

WIDE WELD SPLICE, TYP. —

LAYER OF TPO MEMBRANE TO

HOT DIP GALV ANGLE, TYP.

P.T. 2x LUMBER BLOCKING

BOLTED TO STEEL ANGLE @

3/4" EXT P.T. PLYWOOD, TYP.

3 5/8" METAL STUD @ 16" O.C., TYP.

CLEAT & END FLASHING BY METAL PANEL

SOFFIT "J" CHANNEL, TYP.

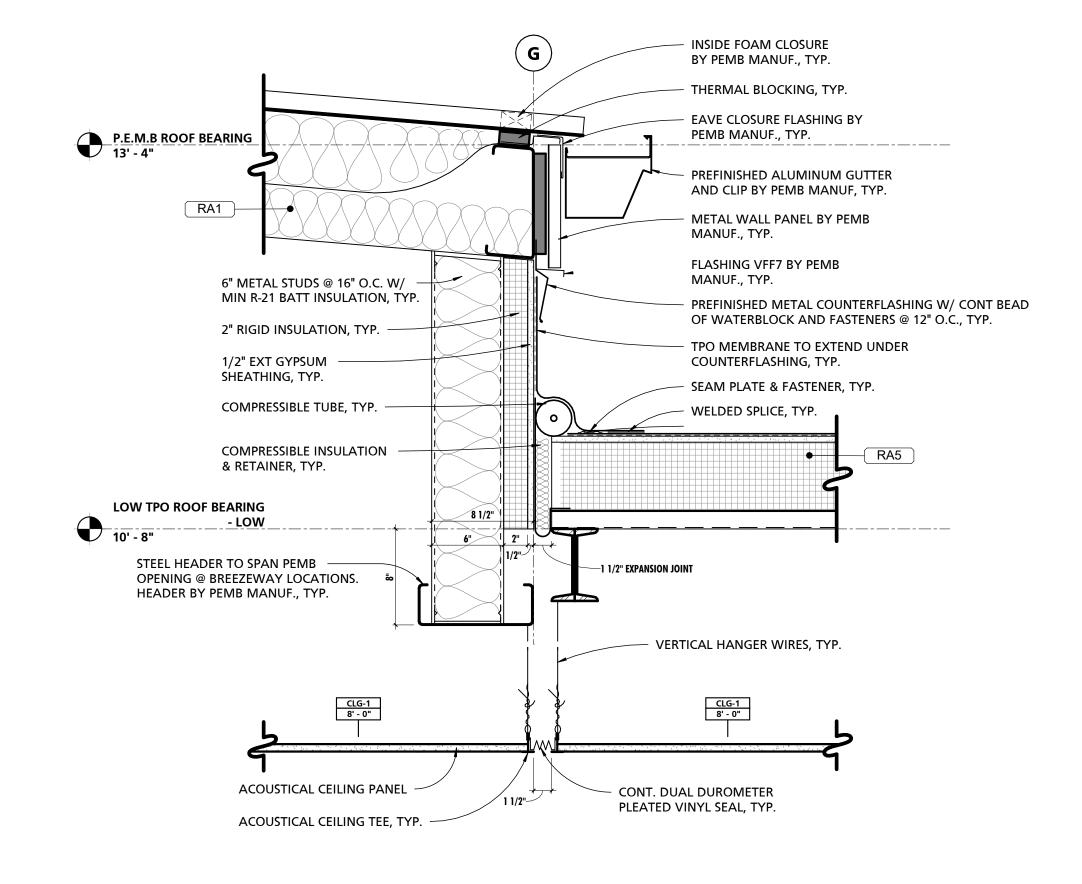
24" O.C., TYP.

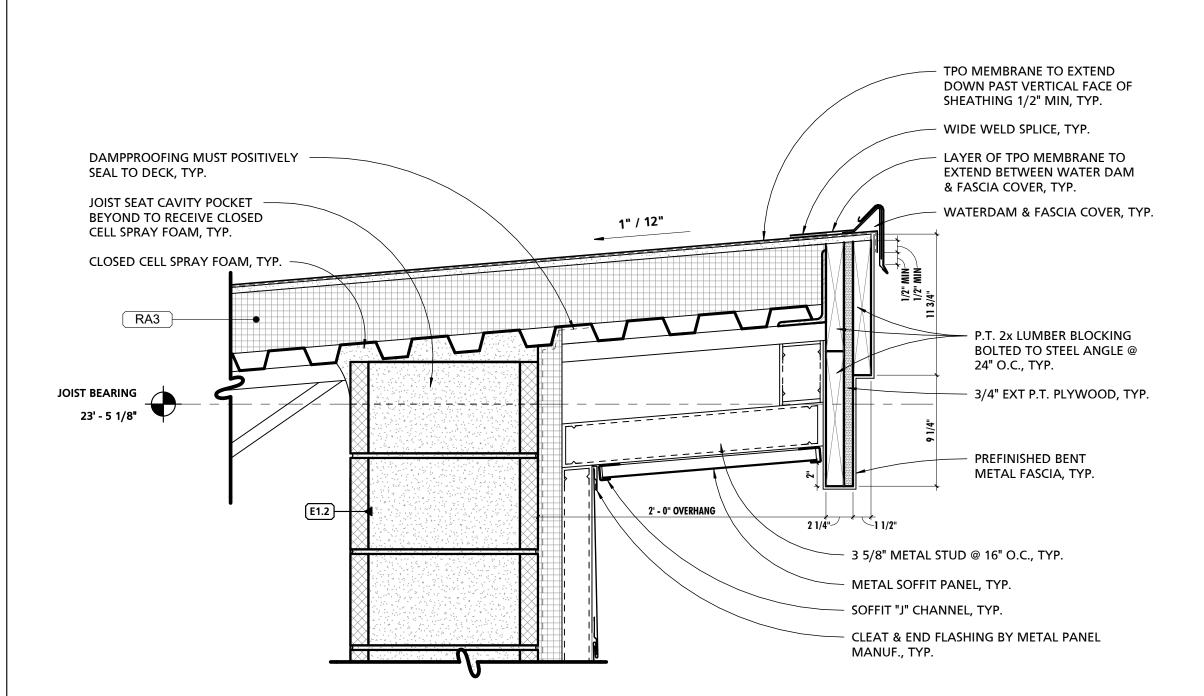
PREFINISHED BENT METAL FASCIA, TYP.

EXTEND BETWEEN WATER DAM

WATERDAM & FASCIA COVER, TYP.

DOWN PAST VERTICAL FACE OF







TYP. TPO ROOF TERMINATION AT PEMB

CHARLES COUNTY
CHARLES COUNTY ANIMAL CARE CI
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WALDORF, MARYLAND 20602

PROJECT NUMBER:
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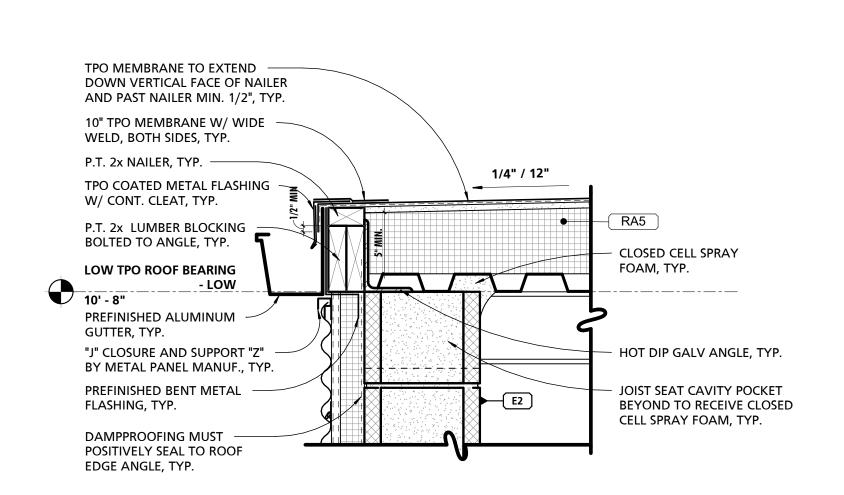
DRAWING TITLE:
ROOF EDGE DETAILS

A501

SHEET NUMBER:

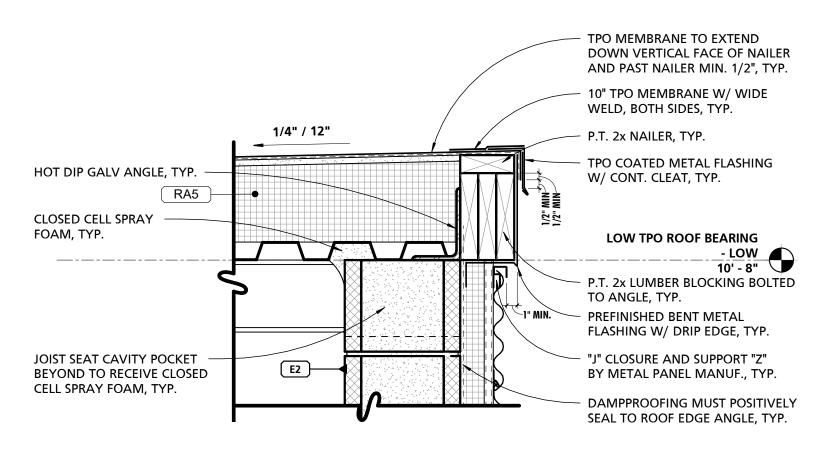
DESCRIPTION DATE

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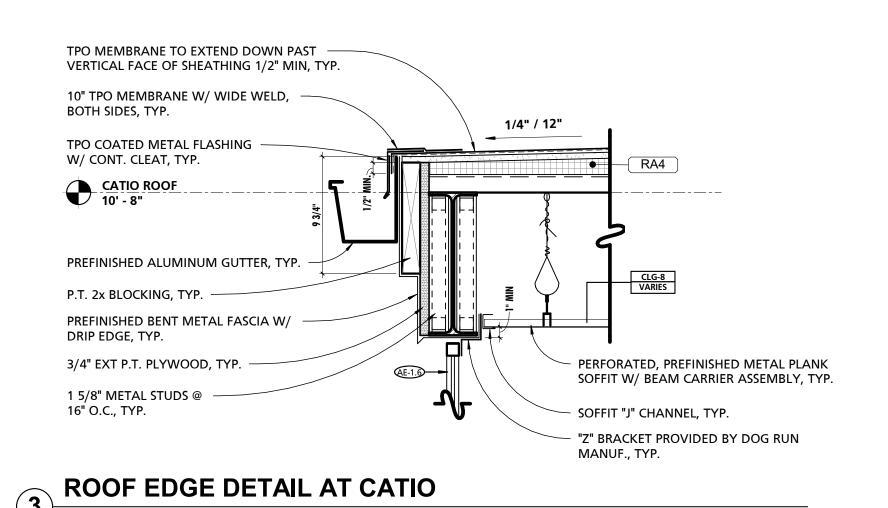


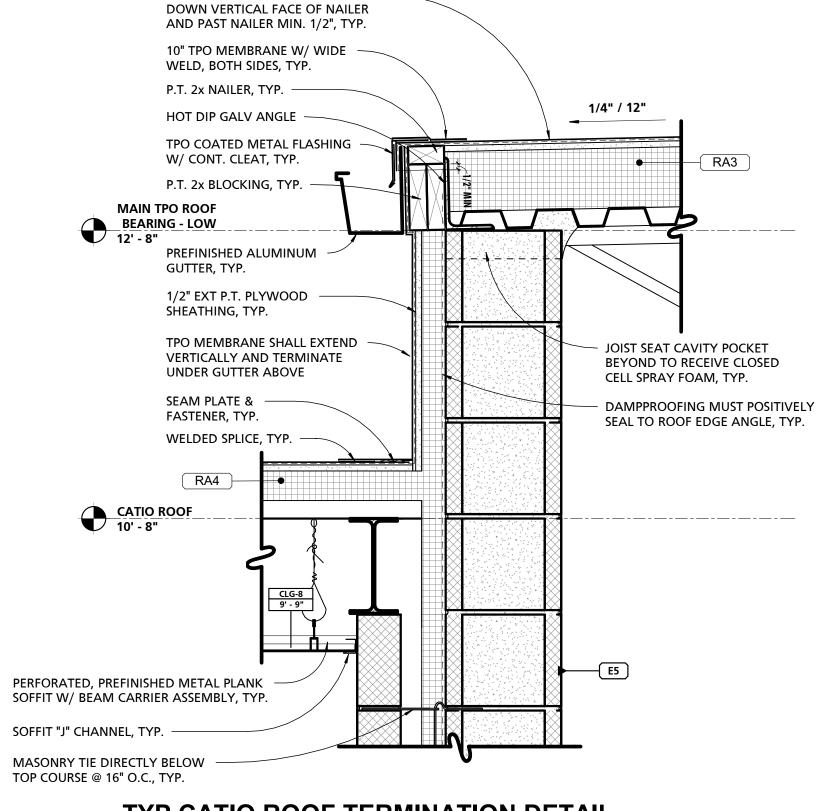
TYP. TPO ROOF EDGE DETAIL AT BREEZEWAY GUTTER

1 1/2" = 1'-0"



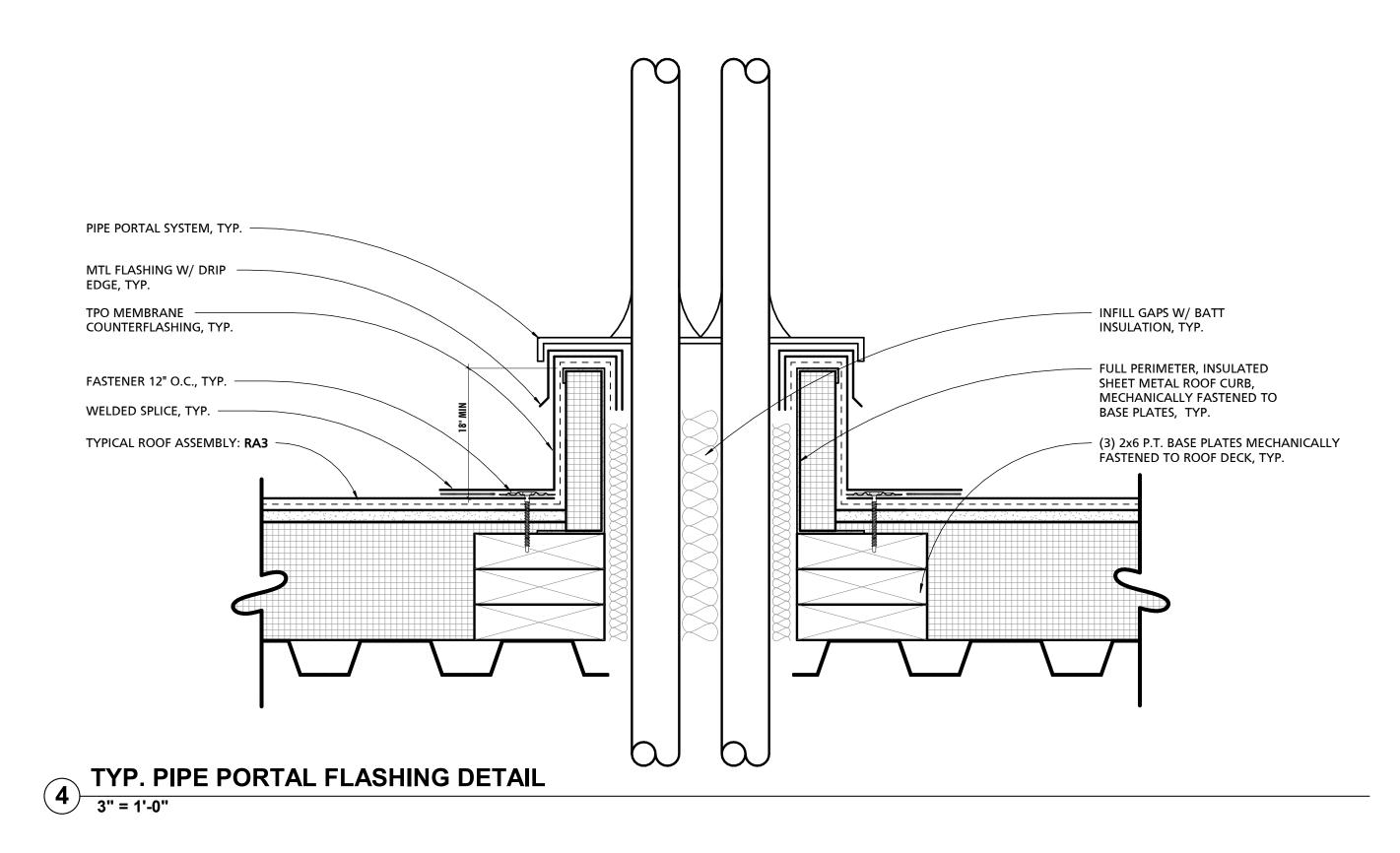
TYP. TPO ROOF HIGH EAVE DETAIL AT BREEZEWAY





TPO MEMBRANE TO EXTEND

7 TYP CATIO ROOF TERMINATION DETAIL
1 1/2" = 1'-0"



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MECHANICAL EQUIPMENT, TYP.

MTL FLASHING W/ DRIP EDGE, TYP.

TPO MEMBRANE COUNTERFLASHING, TYP.

FASTENER 12" O.C., TYP.

WELDED SPLICE, TYP.

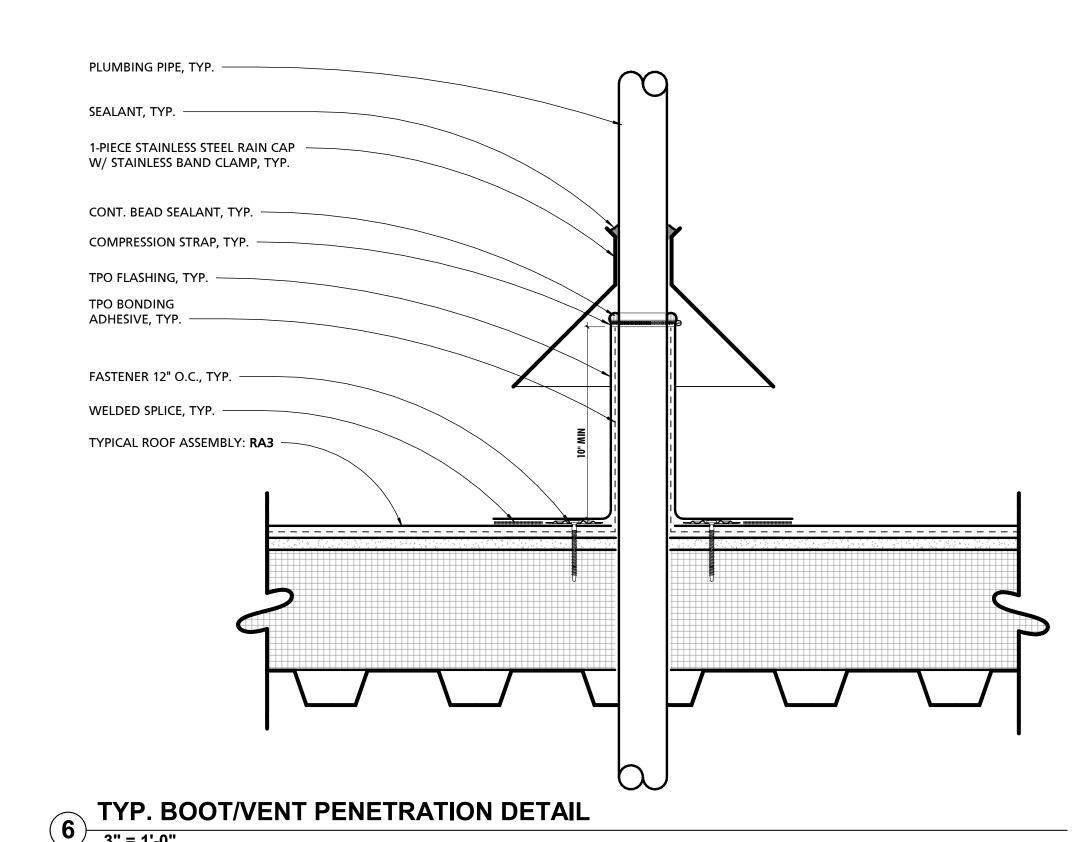
TYPICAL ROOF ASSEMBLY: RA3

FULL PERIMETER, INSULATED SHEET METAL ROOF CURB, MECHANICALLY FASTENED TO BASE PLATES, TYP.

(3) 2x6 P.T. BASE PLATES MECHANICALLY FASTENED TO ROOF DECK, TYP.

TYP. MECHANICAL CURB PENETRATION FLASHING DETAIL

3" = 1'-0"



CHARLES COUNTY
CHARLES COUNTY ANIMAL CARE CEI
COUNTY ANIMAL CARE CEI
COUNTY ANIMAL CARE CEI
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COUNTY

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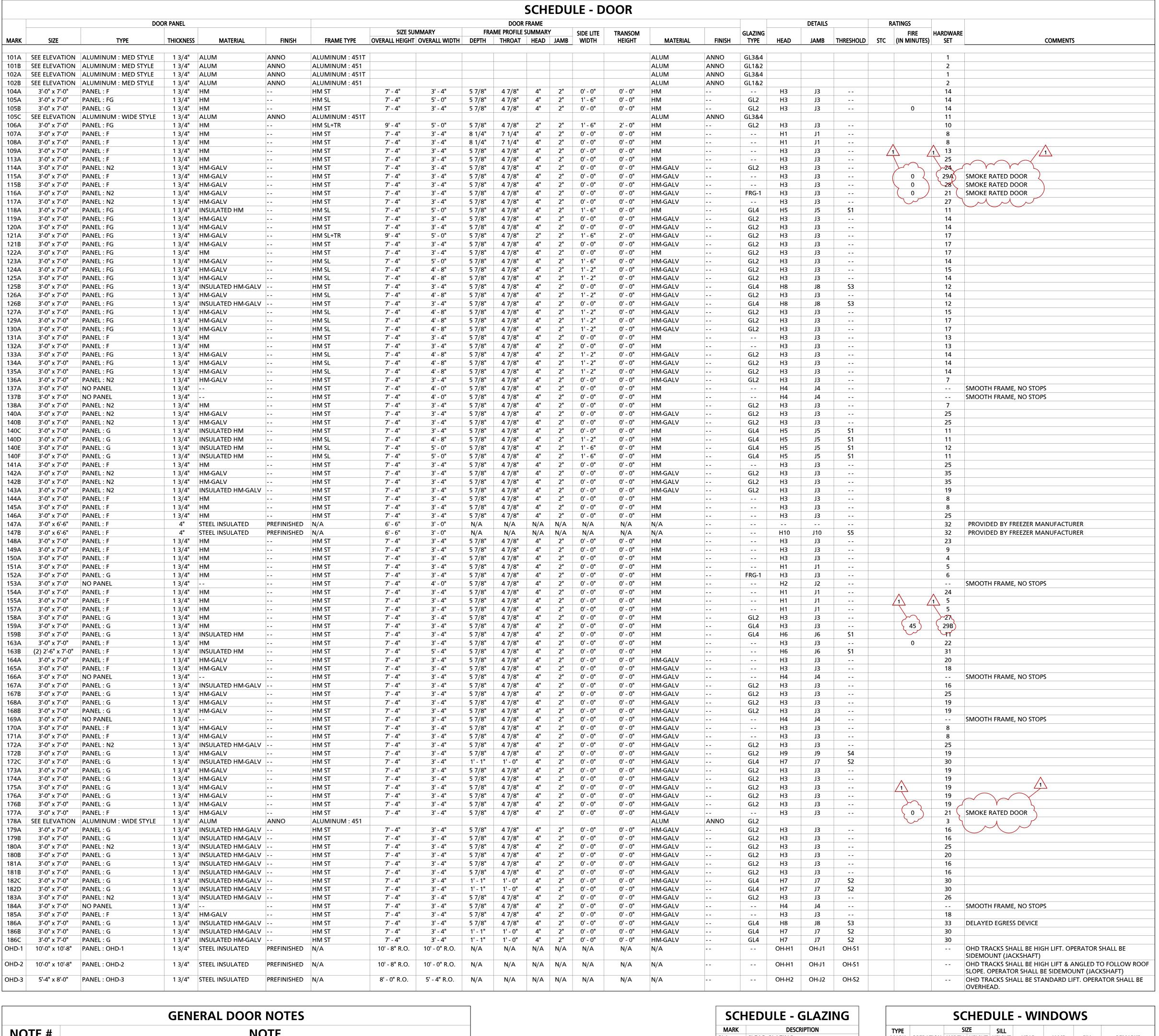
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PROJECT NUMBER:

DRAWING TITLE:
ROOF EDGE DETAILS

A502

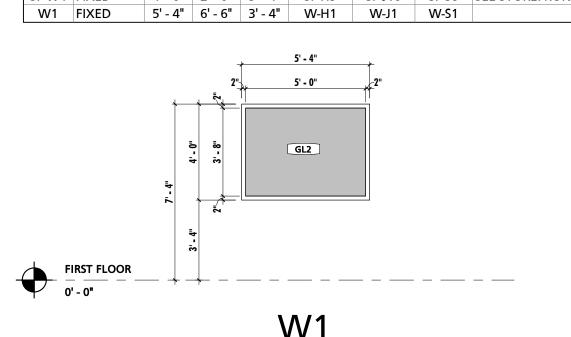


GENERAL DOOR NOTES				
NOTE #	NOTE			
1	CONTRACTOR SHALL FIELD VERIFY ALL EXISTING OPENINGS/MODIFIED OPENINGS PRIOR TO FABRICATION OF DOORS AND FRAMES.			
2	DETAILS MAY VARY AT EACH DOOR. VERIFY EACH CONDITION IN FIELD.			
3	SEE PARTITION SCHEDULE, FLOOR PLAN, AND STRUCTURAL DRAWINGS FOR CONSTRUCTION OF WALLS AND PARTITIONS.			
4	NEW FRAMES IN EXISTING OPENINGS SHALL RECEIVE COUNTER SUNK MASONRY EXPANSION JAMB ANCHORS, 1/2" DIAMETER, IN LIEU OF MASONRY WIRE JAMB ANCHORS.			
5	ALL DOORS SHALL BE SET WITHIN OPENINGS TO ENSURE ADA APPROACH COMPLIANCE AS INDICATED ON SHEET G003.			
6	MOISTURE RESISTANT GYPSUM WALL BOARD SHALL BE UTILIZED IN ALL AREAS WHERE GYPSUM WALL BOARD IS TO BE DIRECTLY ADHERED TO CONCRETE OR MASONRY SURFACES IN INTERIOR APPLICATIONS. SUBSTRATE SHALL BE CLEANED AS REQUIRED AND FREE OF DUST, DEBRIS, AND MOISTURE PRIOR TO ADHESIOI AND FINISHING.			
7	AT WALLS WITH SOUND ATTENUATION BLANKETS, CONTRACTOR SHALL SEAL DOOR FRAMES, GLAZED OPENING FRAMES, INTERSECTIONS, AND OTHER PENETRATIONS WITH ACOUSTICAL SEALANT.			

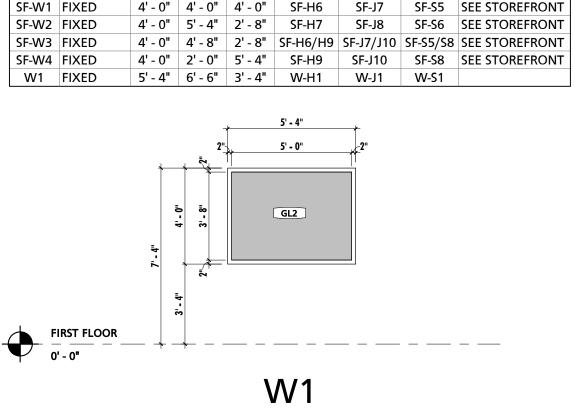
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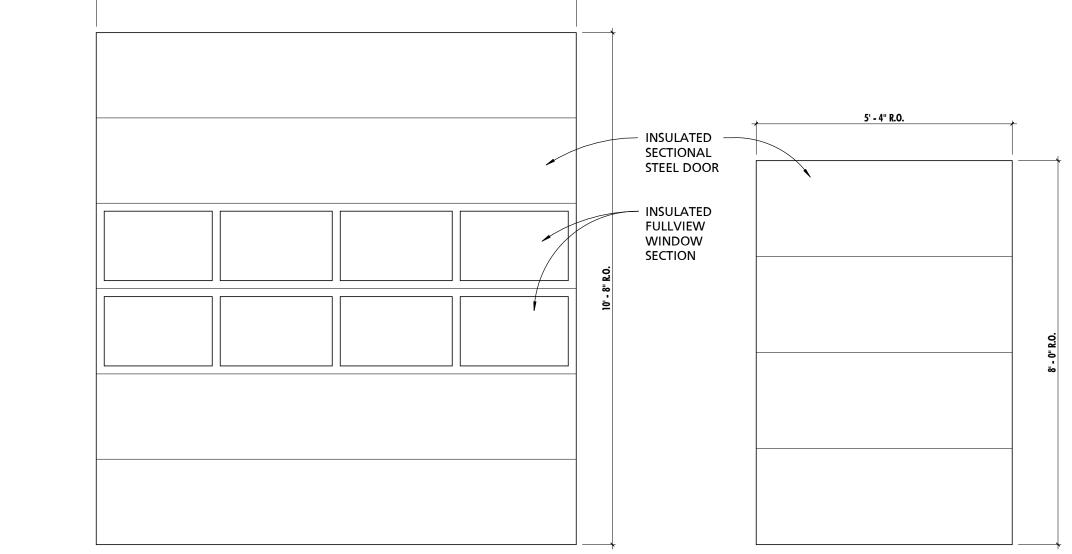
SCHEDULE - GLAZING			
MARK	DESCRIPTION		
GL1	CLEAR GLAZING		
GL2	CLEAR SAFETY GLAZING		
GL3	LOW-E INSULATED GLAZING		
GL4	LOW-E INSULATED SAFETY GLAZING		
FRG-1	FIRE-RATED SAFETY GLAZING		

	SCHEDULE - WINDOWS								
TYPE MARK	OPERATION	SI	ZE HEIGHT	SILL HEIGHT	HEAD	JAMB	SILL	REMARKS	
SF-W1	FIXED	4' - 0"	4' - 0"	4' - 0"	SF-H6	SF-J7	SF-S5	SEE STOREFRONT	
SF-W2	FIXED	4' - 0"	5' - 4"	2' - 8"	SF-H7	SF-J8	SF-S6	SEE STOREFRONT	
SF-W3	FIXED	4' - 0"	4' - 8"	2' - 8"	SF-H6/H9	SF-J7/J10		SEE STOREFRONT	
SF-W4	FIXED	4' - 0"	2' - 0"	5' - 4"	SF-H9	SF-J10	SF-S8	SEE STOREFRONT	
W1	FIXED	5' - 4"	6' - 6"	3' - 4"	W-H1	W-J1	W-S1		



HOLLOW METAL WINDOW TYPES





OHD-1 & OHD-2

OVERHEAD DOOR PANEL TYPES

ARCHITECTURE + MASTER PLANNING 10839-D PHILADELPHIA RD WHITE MARSH, MD 21162 (P) 410-344-1460 (F) 443-403-2460 (E) INFO@MWSARCH.COM WWW.MWSARCH.COM

GLAZING

SCHEDULE

SEE DOOR SCHEDULE FOR ACTUAL PANEL DIMENSIONS.

PANEL(S) WIDTH VARIES

OVERALL WIDTH VARIES

HOLLOW METAL

STANDARD FRAME

PANEL(S) WIDTH VARIES

—SIDE LITE JAMB VARIES

HOLLOW METAL FRAME WITH

HM SL + TR | HOLLOW METAL FRAME W SIDE LITE AND TRANSOM

1.) SEE DOOR SCHEDULE FOR FRAME DIMENSION VARIABLES

FRAME TYPES

1/2" = 1'-0"

DOOR PANEL TYPES

1/2" = 1'-0"

NOT ALL PANEL TYPES MAY BE USED IN THIS PROJECT, SEE DOOR SCHEDULE.

SEE STOREFRONT ELEVATIONS FOR CURTAIN WALL / STOREFRONT ENTRANCE

DIMENSIONS FOR GLAZING INDICATED SHALL CONSTITUTE THE FULL GLAZING WIDTH

GLAZING

SCHEDULE

\$CHEDULE

GLAZING,

—SIDE LITE JAMB VARIES

WITH SIDE LITE

HM SL

GLAZING, SEE

SCHEDULE

HOLLOW METAL FRAME

OHD-3

SEE SCHEDULE

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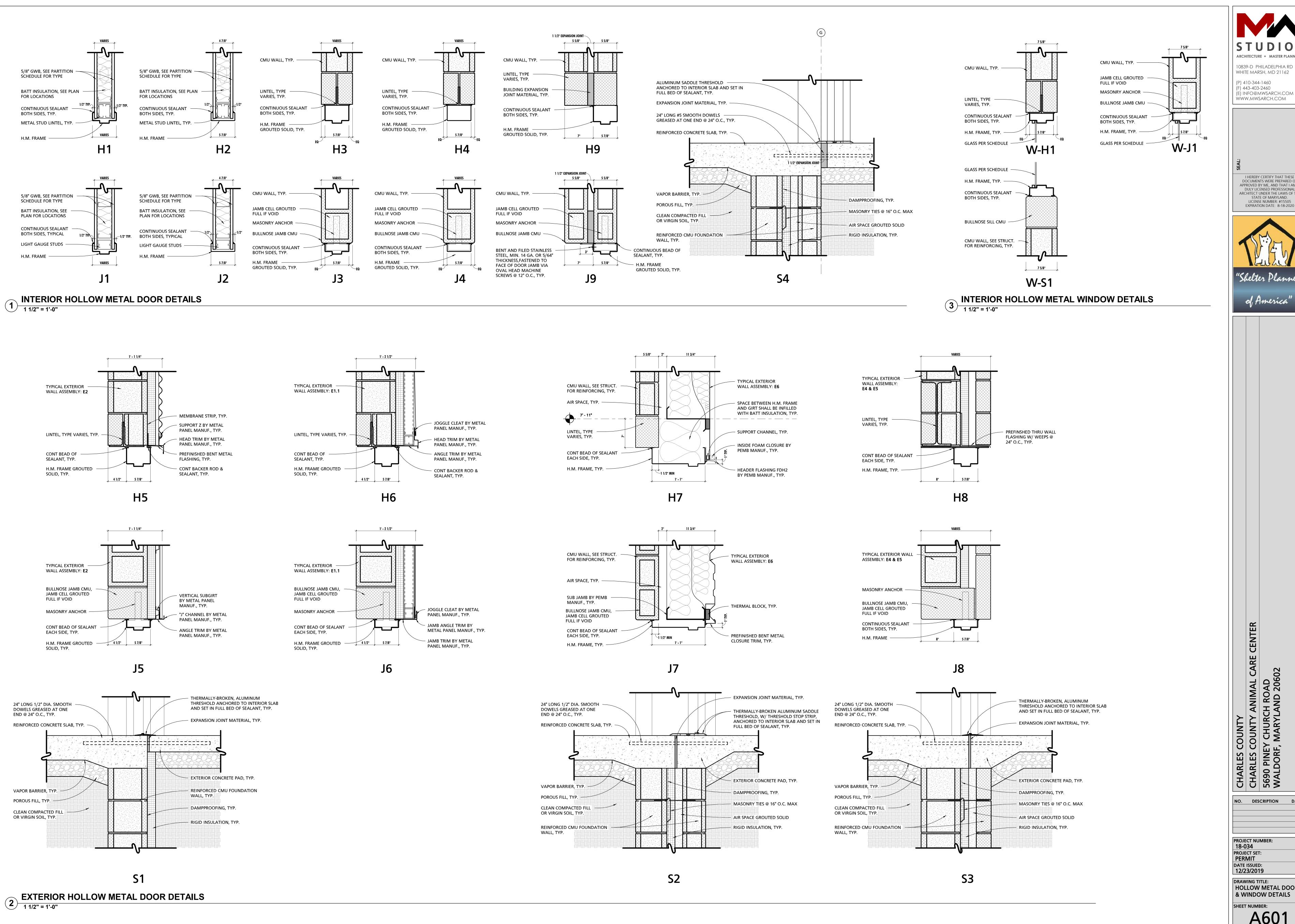






DESCRIPTION 1 PERMIT COMMENTS 03-02-PROJECT SET: DATE ISSUED: 12/23/2019

DRAWING TITLE: DOOR & WINDOW **SCHEDULE & TYPES** SHEET NUMBER:



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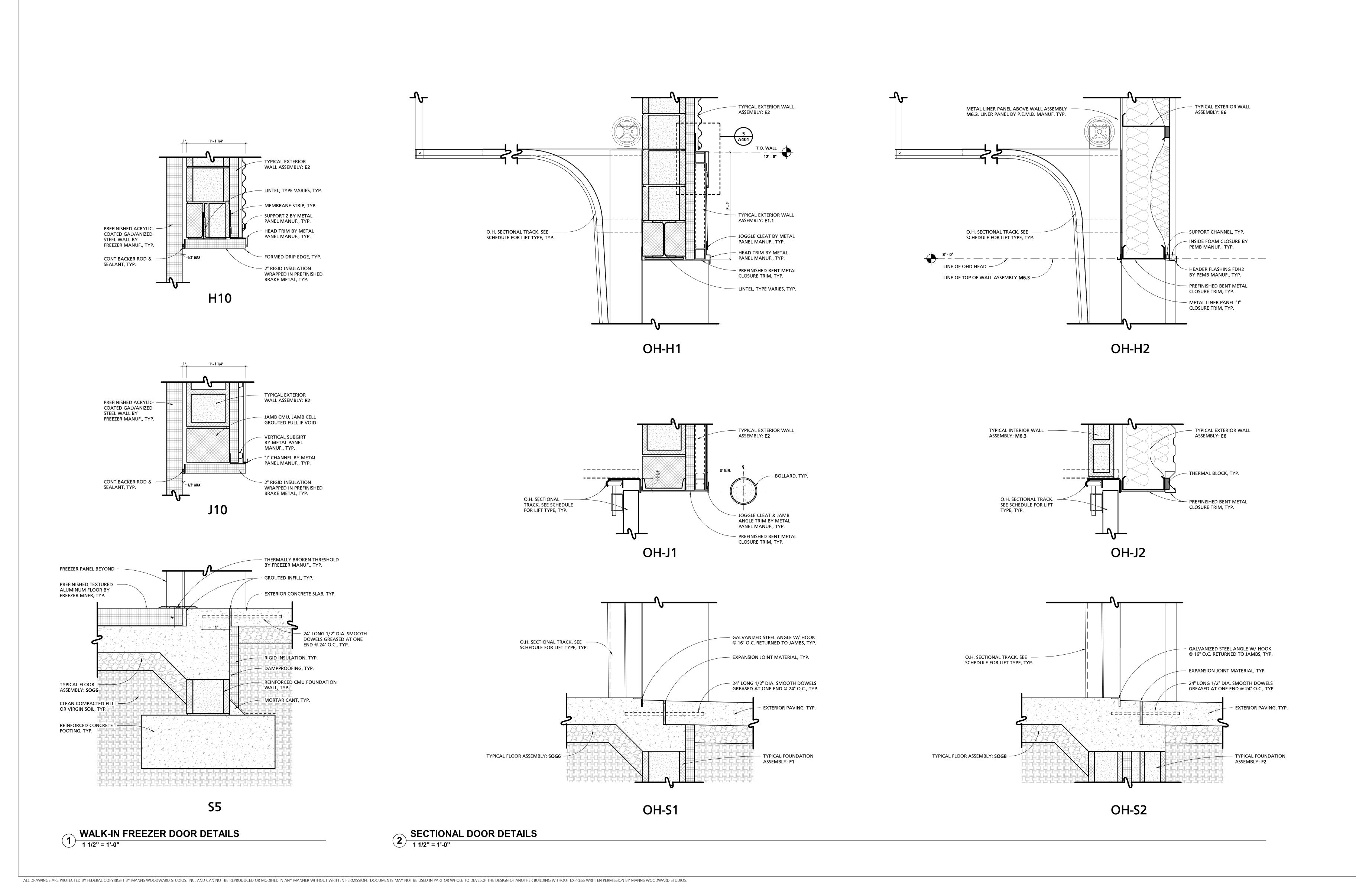
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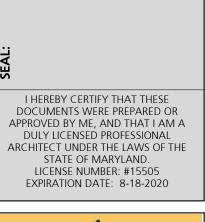
NO. DESCRIPTION DATE

PROJECT NUMBER: PROJECT SET: DATE ISSUED:

12/23/2019 DRAWING TITLE: HOLLOW METAL DOOR & WINDOW DETAILS





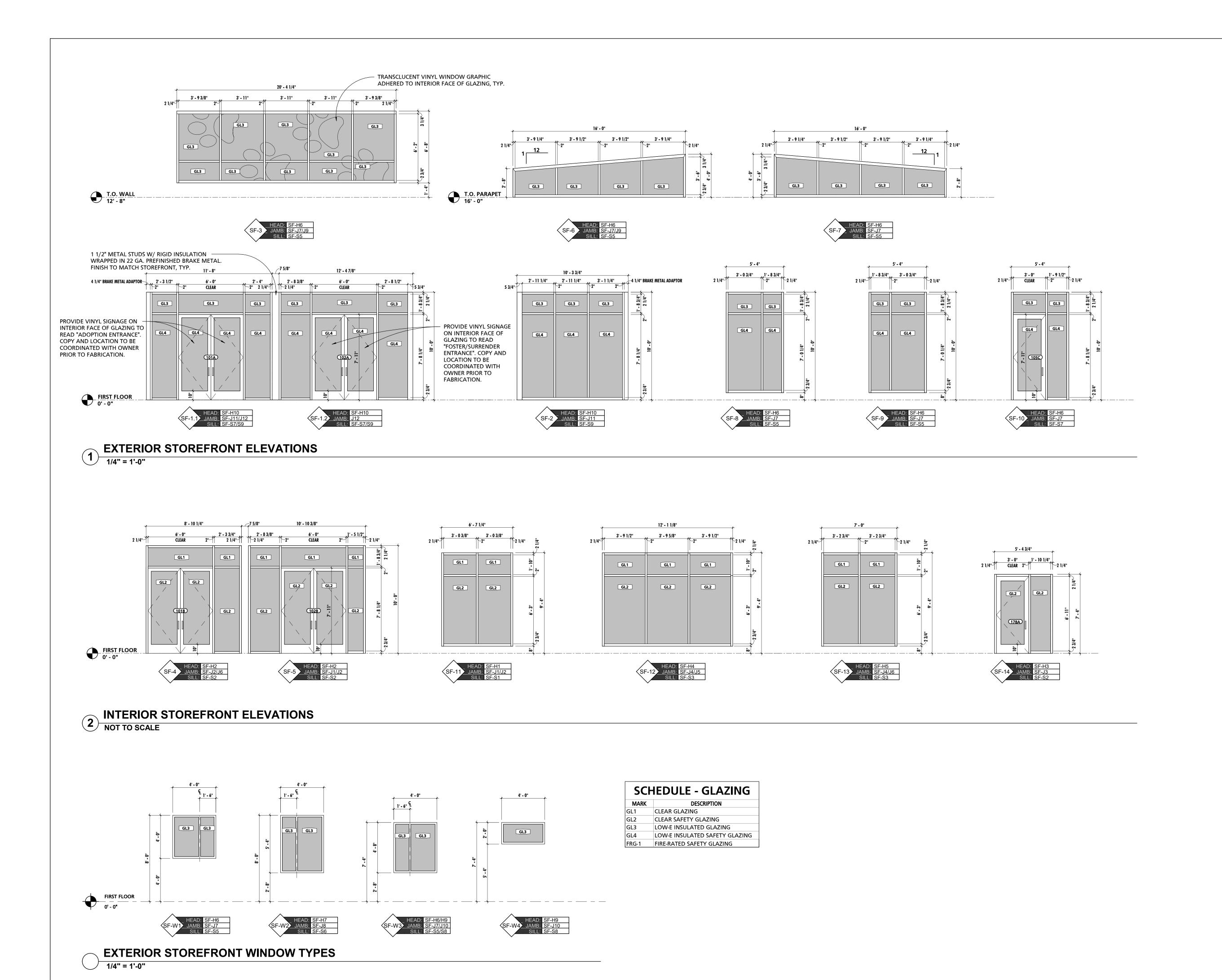




NO. DESCRIPTION DATE

PROJECT NUMBER: PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE: SPECIALTY DOOR DETAILS



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GENERAL OPENING NOTES

NOTE # NOTE

1 CONTRACTOR SHALL FIELD VERIFY ALL CONDITIONS PRIOR TO FABRICATION OF DOORS, WINDOWS, STOREFRONT, ETC.



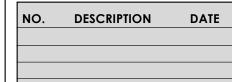
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EXPIRATION DATE: 8-18-2020

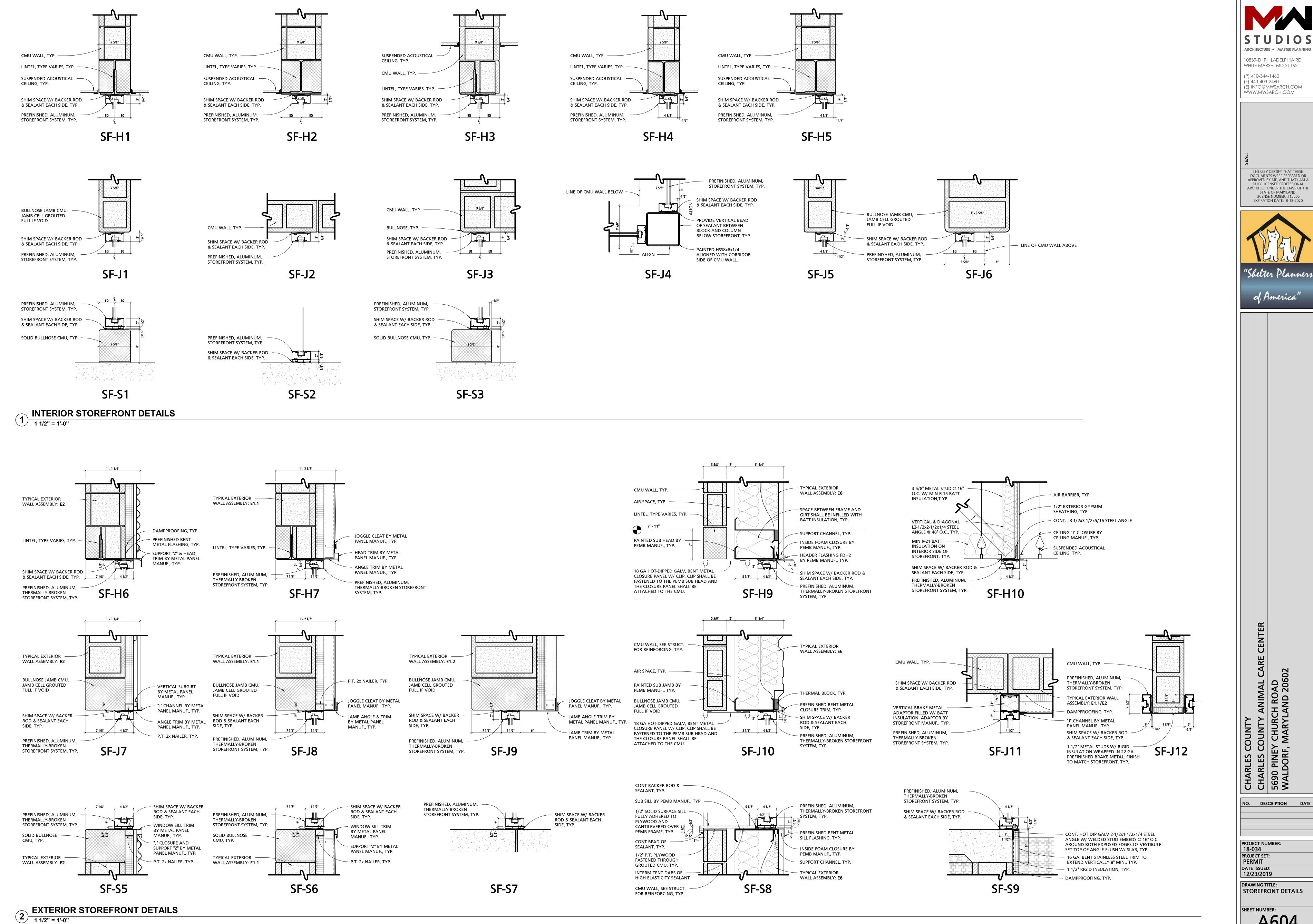


CHARLES COUNTY ANIMAL CARE CENTES OF PINEY CHURCH ROAD WALDORF, MARYLAND 20602



PROJECT NUMBER:
18-034
PROJECT SET:
PERMIT
DATE ISSUED:
12/23/2019

DRAWING TITLE:
STOREFRONT
ELEVATIONS

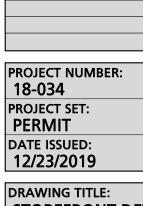


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STOREFRONT DETAILS SHEET NUMBER:

```
HARDWARE SET: 1 – CARD ACCESS DOUBLE EXTERIOR STOREFRONT ENTRANCE
DOORS: 101A, 102A
   CONTINUOUS HINGE – INACTIVE LEAF
   ELECTRIFIED CONTINUOUS HINGE – ACTIVE LEAF
   CONCEALED VERTICAL ROD EXIT DEVICE, NIGHTLATCH FUNCTION ANSI 03, W/
    HEX KEY DOGGING OPTION, NO EXTERIOR TRIM, NO CYLINDER - INACTIVE LEAF
   ELECTRIFIED CONCEALED VERTICAL ROD EXIT DEVICE, NIGHTLATCH FUNCTION
   ANSI 03, WITH ELECTRIC LATCHBOLT RETRACTION OPTION, HEX KEY DOGGING
   OPTION, NO EXTERIOR TRIM – KEY CYLINDER ONLY – ACTIVE LEAF
   CARD READER – PULL SIDE (ACTIVE LEAF) BY SECURITY SYSTEM VENDOR
      ECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR
    DECORATIVE BAR PULLS
    DECORATIVE PUSH BARS
    CYLINDER - ACTIVE LEAF
   OVERHEAD STOPS
    THERMALLY BROKEN, ADA COMPLIANT THRESHOLD
    SET OF PILE WEATHERSTRIPPING BY STOREFRONT MANUFACTURER
  DOOR SWEEPS W/ DRIP CAPS
FUNCTIONAL NARRATIVE: LATCHBOLTS OF ELECTRIFIED EXIT DEVICE ON ACTIVE LEAF ARE
RETRACTED IN ONE OF TWO WAYS: A) CARD SWIPE ACTUATES LATCHBOLTS VIA
ELECTRIFIED HINGE; OR B) KEY IN OUTSIDE CYLINDER RETRACTS LATCHBOLTS. LATCH
BOLTS OF ACTIVE AND INACTIVE LEAVES MAY BE DOGGED OPEN VIA HEX KEY DOGGING
ON PUSHBAR SIDE OF EXIT DEVICES.
HARDWARE SET: 2 - CARD ACCESS DOUBLE INTERIOR STOREFRONT ENTRANCE
DOORS: 101B, 102B
  CONTINUOUS HINGE – INACTIVE LEAF
   ELECTRIFIED CONTINUOUS HINGE – ACTIVE LEAF
    CONCEALED VERTICAL ROD EXIT DEVICE, NIGHTLATCH FUNCTION ANSI 03, W/
   HEX KEY DOGGING OPTION, NO EXTERIOR TRIM, NO CYLINDER - INACTIVE LEAF
```

ELECTRIFIED CONCEALED VERTICAL ROD EXIT DEVICE, NIGHTLATCH FUNCTION ANSI 03, WITH ELECTRIC LATCHBOLT RETRACTION OPTION, HEX KEY DOGGING OPTION, NO EXTERIOR TRIM – KEY CYLINDER ONLY – ACTIVE LEAF

CARD READER – PULL SIDE (ACTIVE LEAF) BY SECURITY SYSTEM VENDOR SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR DECORATIVE BAR PULLS

CYLINDER – ACTIVE LEAF

OVERHEAD STOPS

THERMALLY BROKEN, ADA COMPLIANT THRESHOLD SET OF PILE WEATHERSTRIPPING BY STOREFRONT MANUFACTURER

FUNCTIONAL NARRATIVE: LATCHBOLTS OF ELECTRIFIED EXIT DEVICE ON ACTIVE LEAF ARE RETRACTED IN ONE OF TWO WAYS: A) CARD SWIPE ACTUATES LATCHBOLTS VIA ELECTRIFIED HINGE; OR B) KEY IN OUTSIDE CYLINDER RETRACTS LATCHBOLTS. LATCH BOLTS OF ACTIVE AND INACTIVE LEAVES MAY BE DOGGED OPEN VIA HEX KEY DOGGING ON PUSHBAR SIDE OF EXIT DEVICES.

HARDWARE SET: 3 – SINGLE INTERIOR STOREFRONT DOOR			
DOORS: 178A			
1	CONTINOUS HINGE		
1	MORTISE EXIT DEVICE, NIGHTLATCH FUNCTION ANSI 03 W/ HEX KEY DOGGING OPTION		
1	CYLINDER		
1	SURFACE CLOSER W/ HOLD OPEN		
1	WALL BUMPER		
1	SET OF PERIMETER GASKETING		
FUN	CTIONAL NARRATIVE: CARD SWIPE ON OUTSIDE RELEASES ELECTRIC STRIKE,		
ALL	OWING FREE ACCESS FROM PULL SIDE. PUSH SIDE ALWAYS OPERABLE BY PUSH PAD		
ON	EXIT DEVICE.		

HARDWARE SET: 4 – SINGLE INTERIOR DOOR W/ PULL SIDE ACCESS CONTROL & OVERHEAD STOP DOORS: 150A 3 BUTT HINGES BORED LOCKSET, STOREROOM FUNCTION ANSI F86 ELECTRIC STRIKE - FAIL SECURE CARD READER – PULL SIDE - BY SECURITY SYSTEM VENDOR SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR CYLINDER 1 CLOSER W/ HOLD OPEN
1 OVERHEAD STOP SET OF PERIMETER GASKETING

3 SILENCERS FUNCTIONAL NARRATIVE: CARD SWIPE ON OUTSIDE RELEASES ELECTRIC STRIKE, ALLOWING FREE ACCESS FROM PULL SIDE. KEY IN OUTSIDE CYLINDER RETRACTS LATCH BOLT. INTERIOR LEVER ALWAYS OPERABLE.

ADA COMPLIANT SADDLE THRESHOLD

GENERAL NOTES:

DOORS: 151A, 155A, 157A		
3	BUTT HINGES	
1	BORED LOCKSET, OFFICE FUNCTION ANSI F82	
1	CYLINDER	
1	WALL BUMPER	
3	SILENCERS	

HARDWARE SET: 6 – SINGLE INTERIOR DOOR W/ OFFICE LOCKSET & OVERHEAD STOP DOORS: 152A		
1	BORED LOCKSET, OFFICE FUNCTION ANSI F82	
1	CYLINDER	
1	OVERHEAD STOP W/ HOLD OPEN	
3	SILENCERS	
1	SET OF PERIMETER GASKETING	
1	ADA COMPLIANT SADDLE THRESHOLD	

HARDWARE SET: 7 – SINGLE INTERIOR DOOR W/ OFFICE LOCKSET & ARMOR PLATE DOORS: 136A, 138A **BUTT HINGES** BORED LOCKSET, OFFICE FUNCTION ANSI F82 CYLINDER WALL BUMPER

SILENCERS ARMOR PLATE – PUSH SIDE **GENERAL NOTES:**

HARDWARE SET: 8 - SINGLE INTERIOR DOOR W/ VACANCY INDICATOR DOORS: 107A, 108A, 144A, 145A, 170A, 171A BUTT HINGES MORTISE LOCKSET, PRIVACY FUNCTION ANSI F19 W/ OCCUPIED/VACANCY NOTIFICATION WALL BUMPER SET OF PERIMETER GASKETING
ADA COMPLIANT SADDLE THRESHOLD **GENERAL NOTES:**

HARDWARE SET: 9 – SINGLE INTERIOR DOOR W/ VACANCY INDICATOR & OVERHEAD DOORS: 149A MORTISE LOCKSET, PRIVACY FUNCTION ANSI F19 W/ OCCUPIED/VACANCY OVERHEAD STOP SET OF PERIMETER GASKETING ADA COMPLIANT SADDLE THRESHOLD GENERAL NOTES: HARDWARE SET: 10 - SINGLE INTERIOR DOOR W/ CLASSROOM LOCKSET & PULL SIDE

ACCESS CONTROL DOORS: 106A **BUTT HINGES** BORED LOCKSET, CLASSROOM FUNCTION ANSI F84

ELECTRIC STRIKE – FAIL SAFE CARD READER – PULL SIDE - BY SECURITY SYSTEM VENDOR SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR CYLINDER CLOSER W/ HOLD OPEN WALL BUMPER

FUNCTIONAL NARRATIVE: CARD SWIPE ON OUTSIDE RELEASES ELECTRIC STRIKE, ALLOWING FREE ACCESS FROM PULL SIDE. PUSH SIDE ALWAYS OPERABLE BY LEVER.

HARDWARE SET: 11 – SINGLE EXTERIOR DOOR W/ PULL SIDE ACCESS CONTROL DOORS: 105C, 118A, 140C, 140D, 140F, 159B **BUTT HINGES NRP** MORTISE LOCKSET, OFFICE FUNCTION ANSI F20 ELECTRIC STRIKE – FAIL SECURE CARD READER – PULL SIDE - BY SECURITY SYSTEM VENDOR SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR CYLINDER OVERHEAD STOP LATCH PROTECTOR PLATE THERMALLY BROKEN, ADA COMPLIANT THRESHOLD SET OF PERIMETER GASKETING DOOR SWEEP W/ DRIP CAP FUNCTIONAL NARRATIVE: CARD SWIPE ON OUTSIDE RELEASES ELECTRIC STRIKE,

ALLOWING FREE ACCESS FROM PULL SIDE. PUSH SIDE ALWAYS OPERABLE BY LEVER

HARDWARE SET: 12 – SINGLE EXTERIOR DOOR W/ OFFICE LOCKSET DOORS: 125B, 126B, 140E BUTT HINGES NRP MORTISE LOCKSET, OFFICE FUNCTION ANSI F20 CYLINDER OVERHEAD STOP LATCH PROTECTOR PLATE SECURITY DOOR CONTACTS - BY SECURITY SYSTEM VENDOR THERMALLY BROKEN, ADA COMPLIANT THRESHOL SET OF PERIMETER GASKETING DOOR SWEEP W/ DRIP CAP

FUNCTIONAL NARRATIVE: HARDWARE SET: 13 – SINGLE INTERIOR DOOR W/ STOREROOM LOCKSET & WALL DOORS: 109A, 131A, 132A BORED LOCKSET, STOREROOM FUNCTION ANSI F86 CYLINDER WALL BUMPER SILENCERS GENERAL NOTES: PUSH SIDE TRIM SHALL ALWAYS BE LOCKED, OPERABLE BY KEY. PULL SIDE TRIM SHALL ALWAYS BE FREE EGRESS. DOOR 109A SHALL RECEIVE (1) SET OF PERIMETER GASKETING. HARDWARE SET: 14 – SINGLE INTERIOR DOOR W/ CLASSROOM LOCKSET &

DOORS: 104A, 105A, 105B, 119A, 120A, 123A, 125A, 126A, 133A, 134A, 135A 3 BUTT HINGES BORED LOCKSET, CLASSROOM FUNCTION ANSI F84 CYLINDER CLOSER W/ HOLD OPEN OVERHEAD STOP SILENCERS GENERAL NOTES: DOOR 105A SHALL BE EQUIPPED W/ (1) THERMALLY BROKEN, ADA COMPLIANT THRESHOLD & (1) SET OF PERIMETER GASKETING.

HARDWARE SET: 15 – SINGLE INTERIOR DOOR W/ CLASSROOM LOCKSET & WALL DOORS: 124A, 127A 3 BUTT HINGES 1 BORED LOCKSET, CLASSROOM FUNCTION ANSI F84 CYLINDER WALL BUMPE 3 SILENCERS **GENERAL NOTES**

HARDWARE SET: 16 – SINGLE INTERIOR DOOR W/ CLASSROOM LOCKSET & ARMOR DOORS: 167A, 179A, 179B, 181A, 181B 3 BUTT HINGES BORED LOCKSET, CLASSROOM FUNCTION ANSI F84 I CYLINDER WALL BUMPER SILENCERS ARMOR PLATE – PUSH SIDE SET OF PERIMETER GASKETING 1 ADA COMPLIANT SADDLE THRESHOLD GENERAL NOTES

HARDWARE SET: 17 – SINGLE INTERIOR DOOR W/ CLASSROOM LOCKSET & PERIMETER GASKETING

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DOORS: 121A, 121B, 122A, 129A, 130A BUTT HINGES BORED LOCKSET, CLASSROOM FUNCTION ANSI F84
 CYLINDER 1 WALL BUMPER 1 SET OF PERIMETER GASKETING GENERAL NOTES:

HARDWARE SET: 18 – SINGLE INTERIOR DOOR W/ PASSAGE LEVER SET & WALL DOORS: 165A, 185A 3 BUTT HINGES BORED LEVER SET, PASSAGE FUNCTION ANSI F75 CLOSER W/ HOLD OPEN WALL BUMPER SILENCERS KICK PLATE – PUSH SIDE GENERAL NOTES: HARDWARE SET: 19 – SINGLE INTERIOR DOOR W/ PASSAGE LEVER SET & PERIMETER DOORS: 110A, 111A, 143A, 168A, 168B, 172B, 173A, 174A, 175A, 176A, 176B, 180B 3 BUTT HINGES BORED LEVER SET, PASSAGE FUNCTION ANSI F75 CLOSER W/ HOLD OPEN WALL BUMPER ARMOR PLATE – PUSH SIDE SET OF PERIMETER GASKETING ADA COMPLIANT SADDLE THRESHOLD GENERAL NOTES: DOOR 180B SHALL RECEIVE OVERHEAD STOP IN PLACE OF WALL HARDWARE SET: 20 – SINGLE INTERIOR DOOR W/ PASSAGE LEVER SET & OVERHEAD DOORS: 164A BORED LEVER SET, PASSAGE FUNCTION ANSI F75 CLOSER W/ HOLD OPEN OVERHEAD STOP

HARDWARE SET: 21 - SINGLE INTERIOR DOOR W/ PASSAGE LEVER SET - SMOKE RATED DOORS: 116A, 177A BUTT HINGES BORED LEVER SET, PASSAGE FUNCTION ANSI F75 OVERHEAD STOP ET OF PERIMETER GASKETING – FIRE RATED ADA COMPLIANT SADDLE THRESHOLD GENERAL NOTES: DOOR 177A SHALL RECEIVE (1) WALL BUMPER IN PLACE OF OVERHEAD STOP. COORDINATE CLOSER AND OVERHEAD STOP FOR PROPER OPERATION WITHOUT CONFLICTS. HARDWARE SET: 22 – SINGLE INTERIOR DOOR W/ STOREROOM LOCKSET & OVERHEAD STOP

DOORS: 163A 3 BUTT HINGES BORED LOCKSET, STOREROOM FUNCTION ANSI F86 CYLINDER CLOSER W/ HOLD OPEN 1 OVERHEAD STOP SILENCERS **GENERAL NOTES:** HARDWARE SET: 23 - SINGLE INTERIOR DOOR W/ STOREROOM LOCKSET & KICK PLATE DOORS: 148A BUTT HINGES BORED LOCKSET, STOREROOM FUNCTION ANSI F86 CYLINDER CLOSER W/ HOLD OPEN OVERHEAD STOP SILENCERS

1 KICK PLATE - PUSH SIDE

GENERAL NOTES:

HARDWARE SET: 24 – SINGLE INTERIOR DOOR W/ PUSH SIDE ACCESS CONTROL DOORS: 114A, 154A BUTT HINGES BORED LOCKSET, STOREROOM FUNCTION ANSI F86 ELECTRIFIED STRIKE – FAIL SECURE CARD READER – PUSH SIDE - BY SECURITY SYSTEM VENDOR ECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR CLOSER W/ HOLD OPEN WALL BUMPER SILENCERS GENERAL NOTES: CARD SWIPE ON OUTSIDE RELEASES ELECTRIC STRIKE, ALLOWING FREE ACCESS FROM PUSH SIDE. PULL SIDE ALWAYS OPERABLE BY LEVER. PUSH SIDE TRIM SHALL ALWAYS BE LOCKED, OPERABLE BY KEY. PULL SIDE TRIM SHALL ALWAYS BE FREE EGRESS. HARDWARE SET: 25 – SINGLE INTERIOR DOOR W/ PUSH SIDE ACCESS CONTROL & DOORS: 113A, 140A, 140B, 141A, 146A, 167B, 172A, 180A

BORED LOCKSET, STOREROOM FUNCTION ANSI F86

CARD READER – PUSH SIDE - BY SECURITY SYSTEM VENDOR

SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR

PERIMETER GASKETING SHALL BE OMITTED ON DOORS 141A AND 180A.

ECTRIFIED STRIKE - FAIL SECURE

CYLINDER

WALL BUMPER

CLOSER W/ HOLD OPEN

ARMOR PLATE - PUSH SIDE

SET OF PERIMETER GASKETING

ADA COMPLIANT SADDLE THRESHOLD

ARMOR PLATE DOORS: 172C, 182C, 182D, 186B, 186C 3 BUTT HINGES, NRP MORTISE LOCKSET, OFFICE FUNCTION ANSI F20 CYLINDER OVERHEAD COMPRESSION STOP
LATCH PROTECTION PLATE ARMOR PLATE - PUSH SIDE THERMALLY BROKEN, ADA COMPLIANT THRESHOLD GENERAL NOTES: CARD SWIPE ON OUTSIDE RELEASES ELECTRIC STRIKE, ALLOWING FREE SET PERIMETER GASKETING ACCESS FROM PUSH SIDE. PULL SIDE ALWAYS OPERABLE BY LEVER. PUSH SIDE TRIM SHALL DOOR SWEEP W/ DRIP CAP ALWAYS BE LOCKED, OPERABLE BY KEY. PULL SIDE TRIM SHALL ALWAYS BE FREE EGRESS.

ON PULL SIDE, ALLOWING FREE ACCESS.

HARDWARE SET: 26 – SINGLE INTERIOR DOOR W/ PUSH SIDE ACCESS CONTROL, ARMOR PLATE & OVERHEAD STOP DOORS: 163B 6 BUTT HINGES NRP DOORS: 183A 3 BUTT HINGES FLUSH BOLTS – INACTIVE LEAF BORED LOCKSET, STOREROOM FUNCTION ANSI F86 1 | ELECTRIFIED STRIKE – FAIL SECURE CARD READER – PUSH SIDE - BY SECURITY SYSTEM VENDOR 1 SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR 1 CYLINDER OVERHEAD STOPS W/ HOLD OPEN 1 CLOSER W/ HOLD OPEN ARMOR PLATE – PUSH SIDE SET PERIMETER GASKETING 3 SILENCERS SET OF PERIMETER GASKETING DOOR SWEEPS W/ DRIP CAPS ADA COMPLIANT SADDLE THRESHOLD GENERAL NOTES: **GENERAL NOTES**: PUSH SIDE TRIM SHALL ALWAYS BE LOCKED, OPERABLE BY KEY. PULL HARDWARE SET: 32 – FREEZER DOOR

SIDE TRIM SHALL ALWAYS BE FREE EGRESS. HARDWARE SET: 27 - SINGLE INTERIOR DOOR W/ PUSH SIDE ACCESS CONTROL & **OVERHEAD STOP** DOORS: 117A, 158A BORED LOCKSET, STOREROOM FUNCTION ANSI F86 ELECTRIFIED STRIKE - FAIL SECURE 1 CARD READER – PUSH SIDE - BY SECURITY SYSTEM VENDOR SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR CLOSER W/ HOLD OPEN OVERHEAD STOP GENERAL NOTES: PUSH SIDE TRIM SHALL ALWAYS BE LOCKED, OPERABLE BY KEY. PULL SIDE TRIM SHALL ALWAYS BE FREE EGRESS.

HARDWARE SET: 28 – SINGLE INTERIOR DOOR W/ PUSH SIDE ACCESS CONTROL & OVERHEAD STOR - SMOKE RATED DOORS: 115B **BUTT HINGES** BORED LOCKSET, STOREROOM FUNCTION ANSI F86
ELECTRIFIED STRIKE – FAIL SECURE
CARD READER – PUSH SIDE - BY SECURITY SYSTEM VENDOR SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR CYLINDER CLOSER OVERHEAD STOP ARMOR PLATE - PUSH SIDE SET OF PERIMETER GASKETING – FIRE RATED
ADA COMPLIANT SADDLE THRESHOLD **GENERAL NOTES**: PUSH SIDE TRIM SHALL ALWAYS BE LOCKED, OPERABLE BY KEY. PULL SIDE TRIM SHALL ALWAYS BE FREE EGRESS. COORDINATE CLOSER AND OVERHEAD STOF FOR PROPER OPERATION WITHOUT CONFLICTS.

HARDWARE(SET: 29A - SINGLE INTERIOR DOOR W/ PUSH SIDE ACCESS CONTROL -DOORS: 115A **BUTT HINGES** BORED LOCKSET, STOREROOM FUNCTION ANSI F86 ELECTRIFIED STRIKE - FAIL SECURE CARD READER – PUSH SIDE - BY SECURITY SYSTEM VENDOR SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR CYLINDER CLOSER WALL BUMPER SILENCERS ARMOR PLATE - PUSH SIDE SET OF PERIMETER GASKETING – FIRE RATED ADA COMPLIANT SADDLE THRESHOLD GENERAL NOTES: PUSH SIDE TRIM SHALL ALWAYS BE LOCKED, OPERABLE BY KEY. PULL SIDE TRIM SHALL ALWAYS BE FREE EGRESS.

HARDWARE SET: 29B - SINGLE INTERIOR DOOR W/ PUSH SIDE ACCESS CONTROL - 45 MIN FIRE RATED DOORS: 159A BUTT HINGES BORED LOCKSET, STOREROOM FUNCTION ANSI F86 ELECTRIFIED STRIKE - FAIL SECURE CARD READER – PUSH SIDE - BY SECURITY SYSTEM VENDOR
 SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR

 CYLINDER CLOSER WALL BUMPER SILENCERS ARMOR PLATE - PUSH SIDE SET OF PERIMETER GASKETING – FIRE RATED ADA COMPLIANT SADDLE THRESHOLD GENERAL NOTES: PUSH SIDE TRIM SHALL ALWAYS BE LOCKED, OPERABLE BY KEY. PULL

SIDE TRIM SHALL ALWAYS BE FREE EGRESS. HARDWARE SET: 30 - SINGLE EXTERIOR DOOR W/ PULL SIDE ACCESS CONTROL & CARD READER – PULL SIDE - BY SECURITY SYSTEM VENDOR SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR FUNCTIONAL NARRATIVE: ELECTRIC STRIKE RELEASED BY CARD SWIPE AT CARD READER HARDWARE SET: 31 – DOUBLE EXTERIOR DOOR W/ STOREROOM LOCKSET MORTISE LOCKSET, STOREROOM FUNCTION ANSI F07 SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR 1 METAL ASTRAGAL – ON OUTSIDE FACE OF ACTIVE LEAF ASTRAGAL SEAL – ON INSIDE FACE OF BOTH DOORS THERMALLY BROKEN, ADA COMPLIANT THRESHOLD

DOORS: 147A, 147B HINGES – BY FREEZER MANUFACTURER LOCKING LATCH W/ EMERGENCY RELEASE ON INSIDE – BY FREEZER MANUFACTURER CYLINDER – BY FREEZER MANUFACTURER 1 SET OF MAGNETIC GASKETS – BY FREEZER MANUFACTURER
1 THRESHOLD – BY FREEZER MANUFACTURER
1 KICKPLATE – BOTH SIDES GENERAL NOTES: KEY ALL DOORS IN THIS SET ALIKE.

HARDWARE SET: 33 – SINGLE EXTERIOR DOOR W/ PUSH SIDE ACCESS CONTROL & DELAYED EGRESS DOORS: 186A MORTISE LOCKSET, STOREROOM FUNCTION ANSI F30 ELECTRIC STRIKE - FAIL SAFE CARD READER – PUSH SIDE - BY SECURITY SYSTEM VENDOR SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR DELAYED EGRESS STATION LOCATED ON PUSH SIDE OF DOOR CYLINDER CLOSER OVERHEAD COMPRESSION STOP LATCH PROTECTION PLATE ARMOR PLATE - PUSH SIDI THERMALLY BROKEN, ADA COMPLIANT THRESHOLD SET PERIMETER GASKETING DOOR SWEEP W/ DRIP CAP FUNCTIONAL NARRATIVE: ELECTRIC STRIKE RELEASED BY CARD SWIPE AT CARD READER ON PULL SIDE

ALLOWING FREE ACCESS ELECTRIFIED HARDWARE DESCRIPTION: CARD READER, LOCATED ON PUSH SIDE OF DOOR ASSEMBLY, IS TO BE USED TO RELEASE THE ELECTRIC STRIKE. RELAY FROM THE DELAYED EGRESS STATION SHALL ALSO BE USED TO RELEASE THE ELECTRIC STRIKE. ELECTRIFIED STRIKE SHALL BE FAIL SAFE, UNLOCKING ELECTRIC STRIKE IN EVENT OF POWER OUTAGE. PULL AND PUSH SIDE TRIM SHALL ALWAYS BE LOCKED, OPERABLE BY KEY. **RELAY FUNCTIONS:**

 WHILE IN "SECURE MODE", ACCESS CONTROL WILL BE TRIGGERED BY CARD READER OR THE DELAYED EGRESS STATION WHEN TIMER HAS COUNTED DOWN. THE ACCESS CONTROL CAN BE TURNED OFF VIA SECURITY SYSTEM AND PLACE THE DOOR IN "UNSECURE MODE". PROVIDE ADDITIONAL SIGNAGE CENTERED ON DOOR WIDTH AT REQ'D ADA SIGNAGE HEIGHTS. SIGNAGE TEXT & BRAILLE BELOW SHALL READ "PUSH BUTTON

UNTIL ALARM SOUNDS. DOOR CAN BE OPENED IN 15 SECONDS." LETTERS SHALL

A CONTRASTING BACKGROUND.

SET OF PERIMETER GASKETING – FIRE RATED

NOT BE LESS THAN 1 IN. (2.5 CM) HIGH AND 1/8 IN. (0.3 CM) IN STROKE WIDTH ON

HARDWARE SET: 34 - SINGLE INTERIOR DOOR - 45 MIN FIRE RATED BORED LOCKSET, STOREROOM FUNCTION ANSI F86

ADA COMPLIANT SADDLE THRESHOLD GENERAL NOTES: PULL SIDE TRIM SHALL ALWAYS BE LOCKED, OPERABLE BY KEY. PUSH SIDE TRIM SHALL ALWAYS BE FREE EGRESS. HARDWARE SET: 35 – SINGLE INTERIOR DOOR W/ PUSH SIDE ACCESS CONTROL & PERIMETER GASKETING DOORS: 142A, 142B 3 BUTT HINGES BORED LOCKSET, STOREROOM FUNCTION ANSI F86 1 ELECTRIFIED STRIKE - FAIL SECURE CARD READER – PUSH SIDE - BY SECURITY SYSTEM VENDOR SECURITY DOOR CONTACTS – BY SECURITY SYSTEM VENDOR CYLINDER CLOSER W/ HOLD OPEN WALL BUMPER ARMOR PLATE - PUSH SIDE **SILENCERS** SET OF PERIMETER GASKETING ADA COMPLIANT SADDLE THRESHOLD

general notes: card swipe on outside releases electric strike, allowing free ACCESS FROM PUSH SIDE. PULL SIDE ALWAYS OPERABLE BY LEVER. PUSH SIDE TRIM SHALL ALWAYS BE LOCKED, OPERABLE BY KEY. PULL SIDE TRIM SHALL ALWAYS BE FREE EGRESS.

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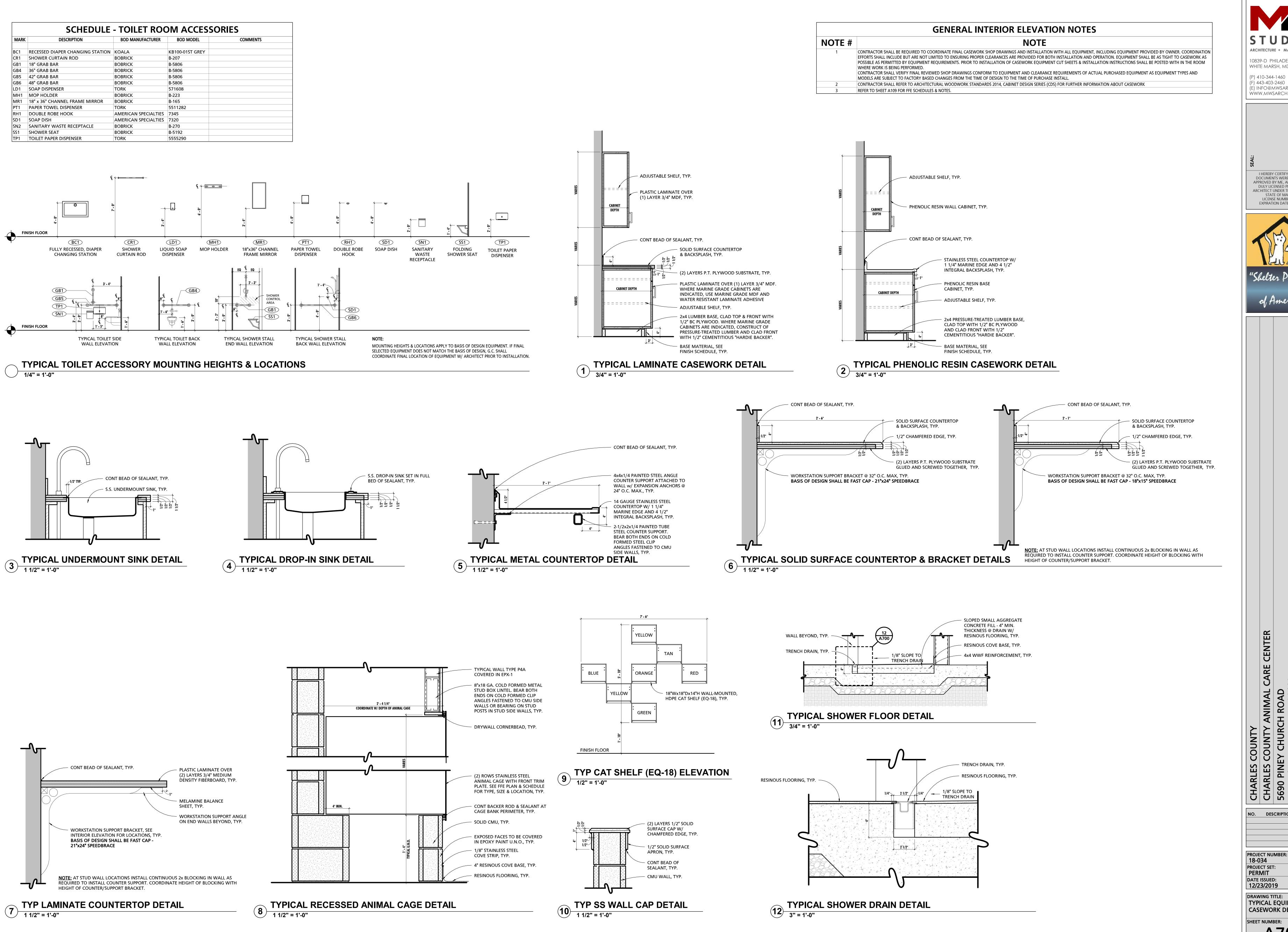
1 PERMIT COMMENTS 03-02-2 PROJECT NUMBER:

DESCRIPTION DATE

PERMIT DATE ISSUED: 12/23/2019

PROJECT SET:

DRAWING TITLE: DOOR HARDWARE



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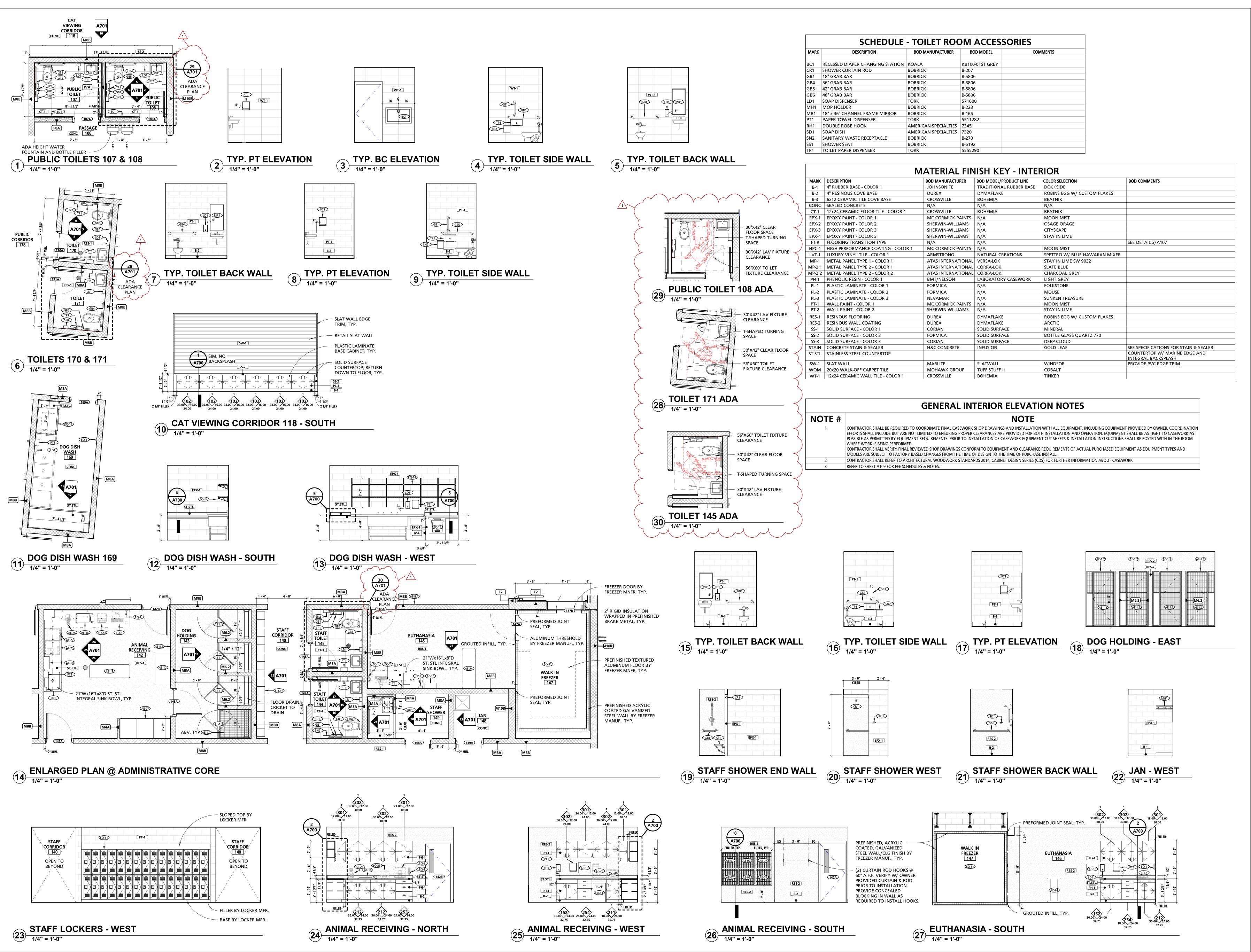
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DESCRIPTION DATE

PROJECT NUMBER: PROJECT SET: PERMIT DATE ISSUED:

12/23/2019 DRAWING TITLE: TYPICAL EQUIPMENT & CASEWORK DETAILS SHEET NUMBER:



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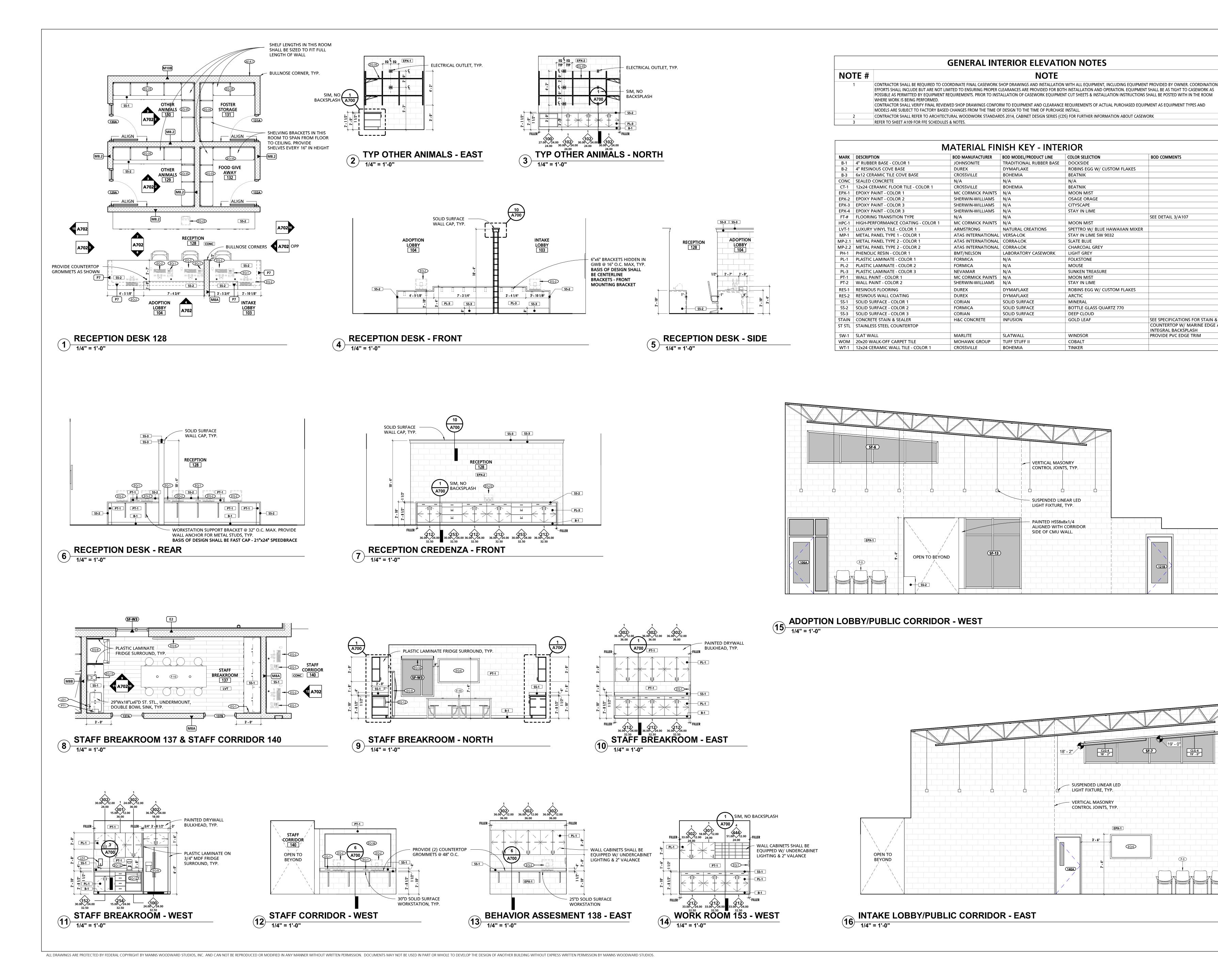
"Shelter Planner

DESCRIPTION DATE PERMIT COMMENTS 03-02-2

PROJECT NUMBER: PROJECT SET: PERMIT

DATE ISSUED: 12/23/2019

DRAWING TITLE: ENLARGED PLANS & INT. ELEVATIONS SHEET NUMBER: A701





BOD COMMENTS

SEE DETAIL 3/A107

SEE SPECIFICATIONS FOR STAIN & SEALER

COUNTERTOP W/ MARINE EDGE AND

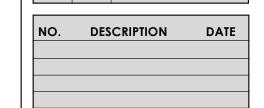
INTEGRAL BACKSPLASH

PROVIDE PVC EDGE TRIM

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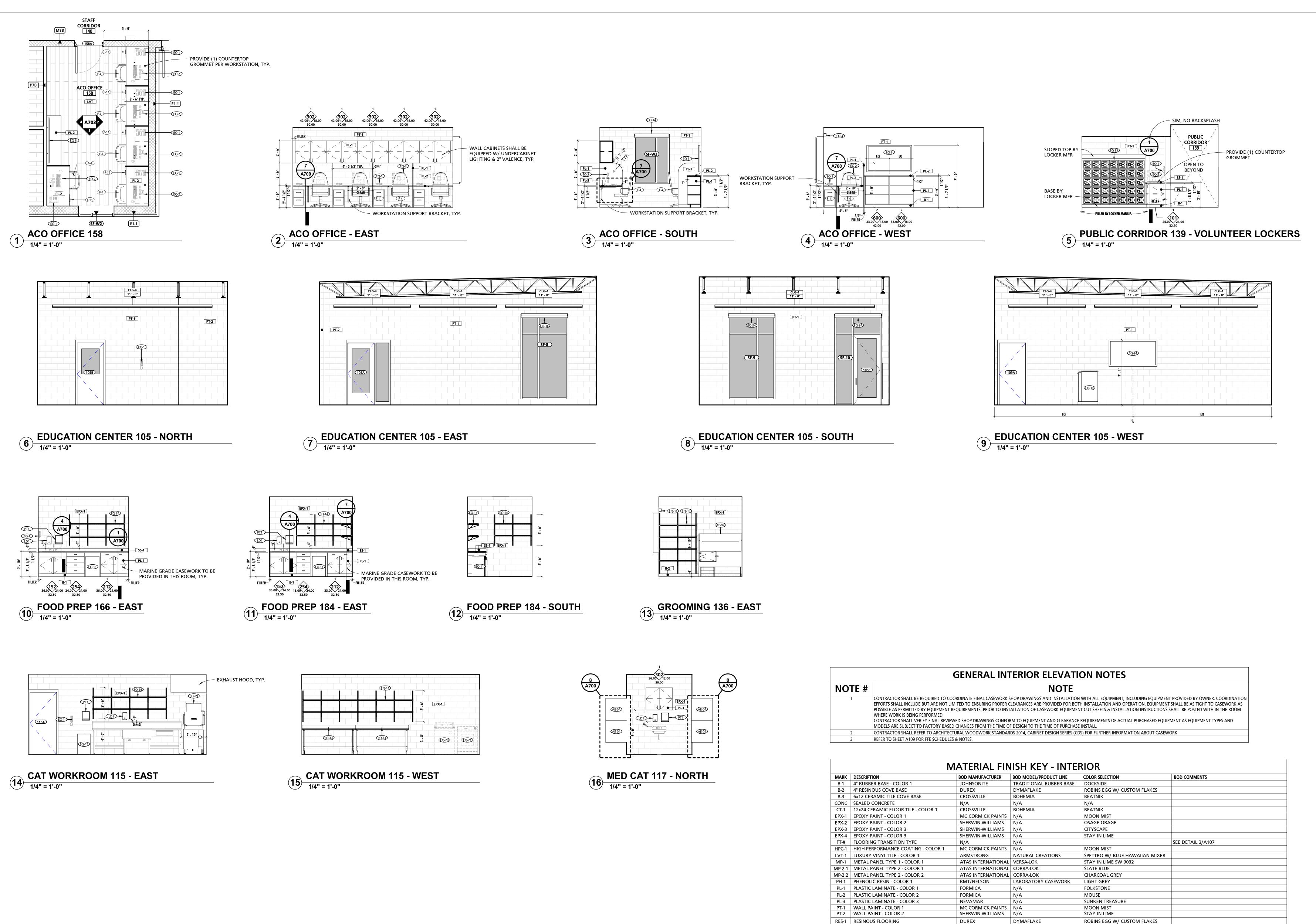




PROJECT NUMBER: PROJECT SET: PERMIT DATE ISSUED:

12/23/2019 DRAWING TITLE: **ENLARGED PLANS & INT.** ELEVATIONS

SHEET NUMBER: A702



RES-2 RESINOUS WALL COATING

SS-1 SOLID SURFACE - COLOR 1

SS-2 SOLID SURFACE - COLOR 2

SS-3 SOLID SURFACE - COLOR 3

STAIN CONCRETE STAIN & SEALER

SW-1 SLAT WALL

ST STL | STAINLESS STEEL COUNTERTOP

WOM 20x20 WALK-OFF CARPET TILE

WT-1 12x24 CERAMIC WALL TILE - COLOR 1

DUREX

CORIAN

FORMICA

CORIAN

MARLITE

CROSSVILLE

H&C CONCRETE

MOHAWK GROUP

DYMAFLAKE

SOLID SURFACE

SOLID SURFACE

SOLID SURFACE

INFUSION

SLATWALL

BOHEMIA

TUFF STUFF II

BOTTLE GLASS QUARTZ 770

SEE SPECIFICATIONS FOR STAIN & SEALER COUNTERTOP W/ MARINE EDGE AND

INTEGRAL BACKSPLASH

PROVIDE PVC EDGE TRIM

DEEP CLOUD

GOLD LEAF

WINDSOR

STUDIOS

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(F) 443-403-2460
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LICENSE NUMBER: #15505
EXPIRATION DATE: 8-18-2020



RLES COUNTY ANIMAL CARE CENTE PINEY CHURCH ROAD DORF, MARYLAND 20602

NO. DESCRIPTION DATE

PROJECT NUMBER: 18-034 PROJECT SET: PERMIT

PERMIT

DATE ISSUED:
12/23/2019

DRAWING TITLE:

DRAWING TITLE:
ENLARGED PLANS & INT.
ELEVATIONS
SHEET NUMBER:

SHEET NUMBER:
A703



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PROJECT SET: PERMIT DATE ISSUED:

12/23/2019 DRAWING TITLE: ENLARGED DOG RUN PLANS & ELEVATIONS SHEET NUMBER: A704

NOTE # SEE SHEET A103 FOR BUILDING ASSEMBLY TYPES, NOTES & DETAILS. SEE SHEET A107 FOR FINISH NOTES & DETAILS. SEE SHEET A109 FOR FFE SCHEDULES, NOTES & DETAILS.



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of America"

NOTE:
1. AE-1.1 SOLID PANELS SHALL ALTERNATE IN COLOR IN THE ORDER OF ORANGE, BLUE, SAGE, YELLOW AND JADE
2. AE-1.3 SOLID PANELS WITHIN STRAY DOG PUBLIC WALKWAY 167 SHALL ALTERNATE IN COLOR IN THE ORDER OF ORANGE, BLUE, SAGE, YELLOW AND JADE
3. ALL OTHER SOLID PANELS SHALL BE PEARL

TYPES - ANIMAL ENCLOSURES

1/4" = 1'-0"

- GUILLOTINE DOOR PULL CABLE ---AND PULLEY ASSEMBLY ON STAFF SIDE OF RUNS - ANIMAL ENCLOSURE, TYP. OUTDOOR STAFF - CABLE GUARD, TYP. CORRIDOR 186 BOND BEAM LINTEL, TYP. COUNTER WEIGHT, TYP. OPENING HEAD, JAMB AND SILL TO RECEIVE RESINOUS COATING, TYP. (AE-2.2) - SOLID BULLNOSE CMU, TYP. BOND BEAM CMU, TYP. -- SLOPED CONCRETE TOPPING SLAB ----W/ RESINOUS FINISH, TYP. 1/4" / 12" 1/4" / 12" 1/4" / 12" FIRST FLOOR
0' - 0" FIRST FLOOR
0' - 0" CRICKET TO DRAIN, TYP SOG6 EXPANSION JOINT MATERIAL CRICKET TO DRAIN, TYP T.O. FOOTING -2' - 0" —----IN LOWER SLAB ONLY, TYP.

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1 TYPICAL DOG RUN CROSS SECTION
1/2" = 1'-0"

TYPICAL INDOOR/OUTDOOR DOG RUN CROSS SECTION

1/2" = 1'-0"

ARLES COUNTY
ARLES COUNTY ANIMAL CARE CENTER
90 PINEY CHURCH ROAD
ALDORF, MARYLAND 20602

PROJECT NUMBER: 18-034

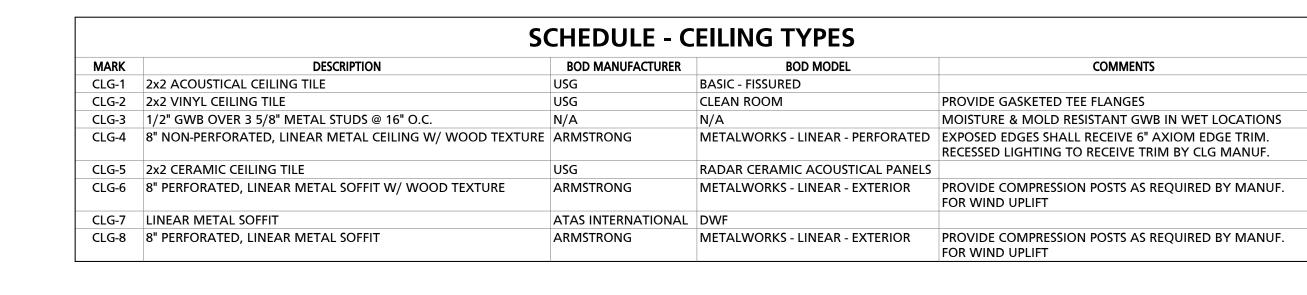
NO. DESCRIPTION DATE

DRAWING TITLE:
ENLARGED DOG RUN
DETAILS

PROJECT SET: PERMIT

DATE ISSUED:

SHEET NUMBER:
A705



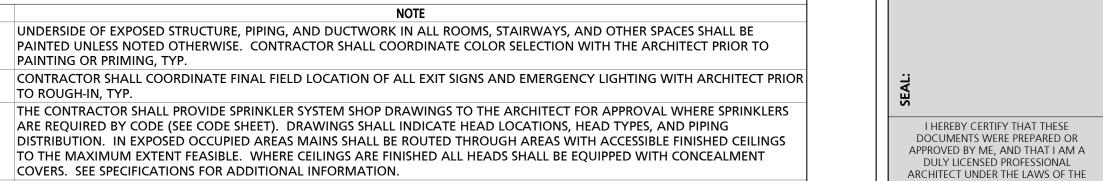


STATE OF MARYLAND.

LICENSE NUMBER: #15505

EXPIRATION DATE: 8-18-2020

"Shelter Planner



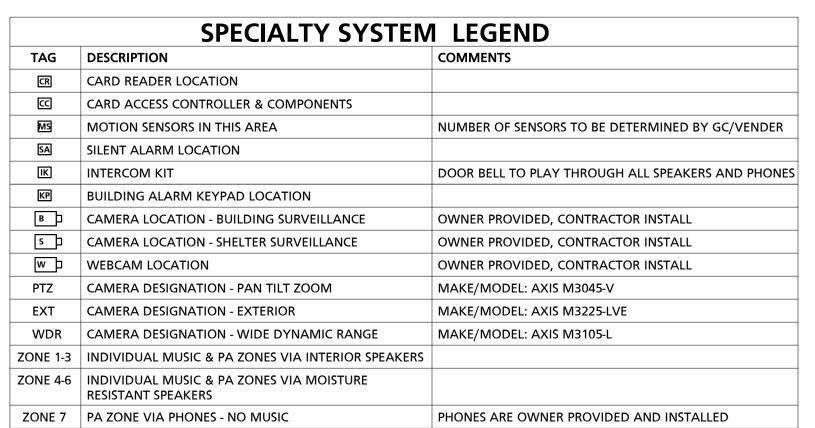
SPRINKLER LOCATIONS DEPICTED HEREIN ARE DIAGRAMMATIC AND ARE SHOWN FOR DESIGN INTENT ONLY. ON ACT CEILINGS IN FIRE-RATED AREAS INSTALL HOLD DOWN CLIPS ON ACOUSTIC PANELS WEIGHING LESS THAN 1 LB. PER SQ. FT.

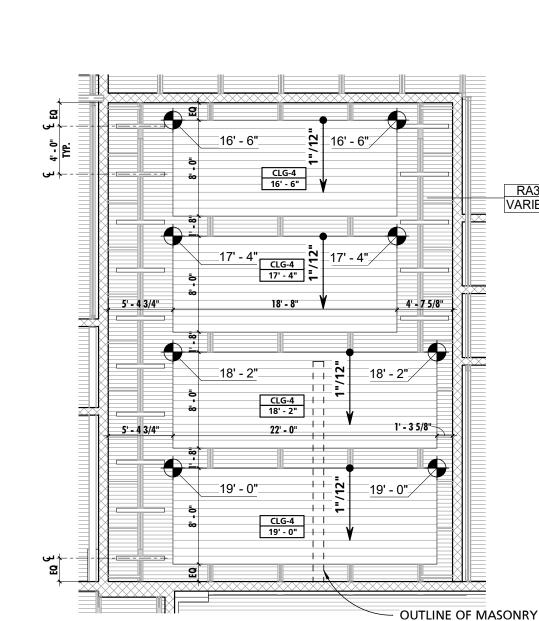
ALL MECHANICAL, ELECTRICAL, PLUMBING, AND SPRINKLER WORK TO OCCUR IN AREAS WHERE THE STRUCTURE IS EXPOSED SHALL BE EXECUTED IN A COORDINATED, NEAT AND WORKMANLIKE MANNER. AT A MINIMUM ALL WIRING SHALL BE RUN THOUGH CONDUITS, PIPE AND DUCT INSULATION SHALL BE NEATLY INSTALLED AND PAINTABLE. ALL PIPES AND DUCTS SHALL BE RUN EITHER PERPENDICULAR OR PARALLEL TO WALL CONSTRUCTION AND SHALL BE INSTALLED AT THE SAME NOMINAL ELEVATION OR SLOPE. ALL MATERIALS AND INSTALLATION METHODS SHALL COMPLY WITH APPLICABLE CODES AND STANDARDS. WHERE MECHANICAL, ELECTRICAL, AND PLUMBING DRAWINGS INDICATE OTHER REQUIREMENTS THE GREATER

WHERE CEILINGS ARE EXPOSED ALL TIES, CABLES, AND SUPPORTS FOR CLOUDS, ELECTRICAL, MECHNICAL EQUIPMENT AND OTHER APPURTENANCES SHALL BE INSTALLED IN A NEAT, ORGANIZED AND WORKMAN LIKE MANNER. VISIBLE TIES SHALL BE

PLUMB/TRUE/SQUARE TO ELEMENTS, TIGHTLY WRAPPED, WITH EXCESS WIRE NEATLY CUT. CONTRACTOR SHALL COORDINATE THE COLOR AND FINISH OF ALL CEILING MOUNTED EQUIPMENT SUCH AS DIFFUSERS, RETURNS, SPEAKERS, ETC. WITH THE ARCHITECT TO ENSURE THERE ARE NO STARK CONTRASTING COLORS. WHERE ACT GRID LAYOUT AT EDGE CONDITIONS FOR 2X2 TILES REQUIRE TILES TO BE CUT TO LESS THAN 3", UTILIZE A 2X4 TILE IN

LIEU OF THE 2X2 TILE. OMIT CILING GRID CROSS MEMBERS AS REQUIRED. NO TILE SHALL EXCEED 27" OR BE LESS THAN 3" AT PERIMETER CONDITIONS. IT IS THE CONTRACTORS RESPONSIBILITY TO COORDINATE GRID MAINS AS REQUIRED TO ACHIEVE THIS





PARTIAL RCP AT LOBBY ATRIUM

1/8" = 1'-0"

WALL BELOW

NO. DESCRIPTION

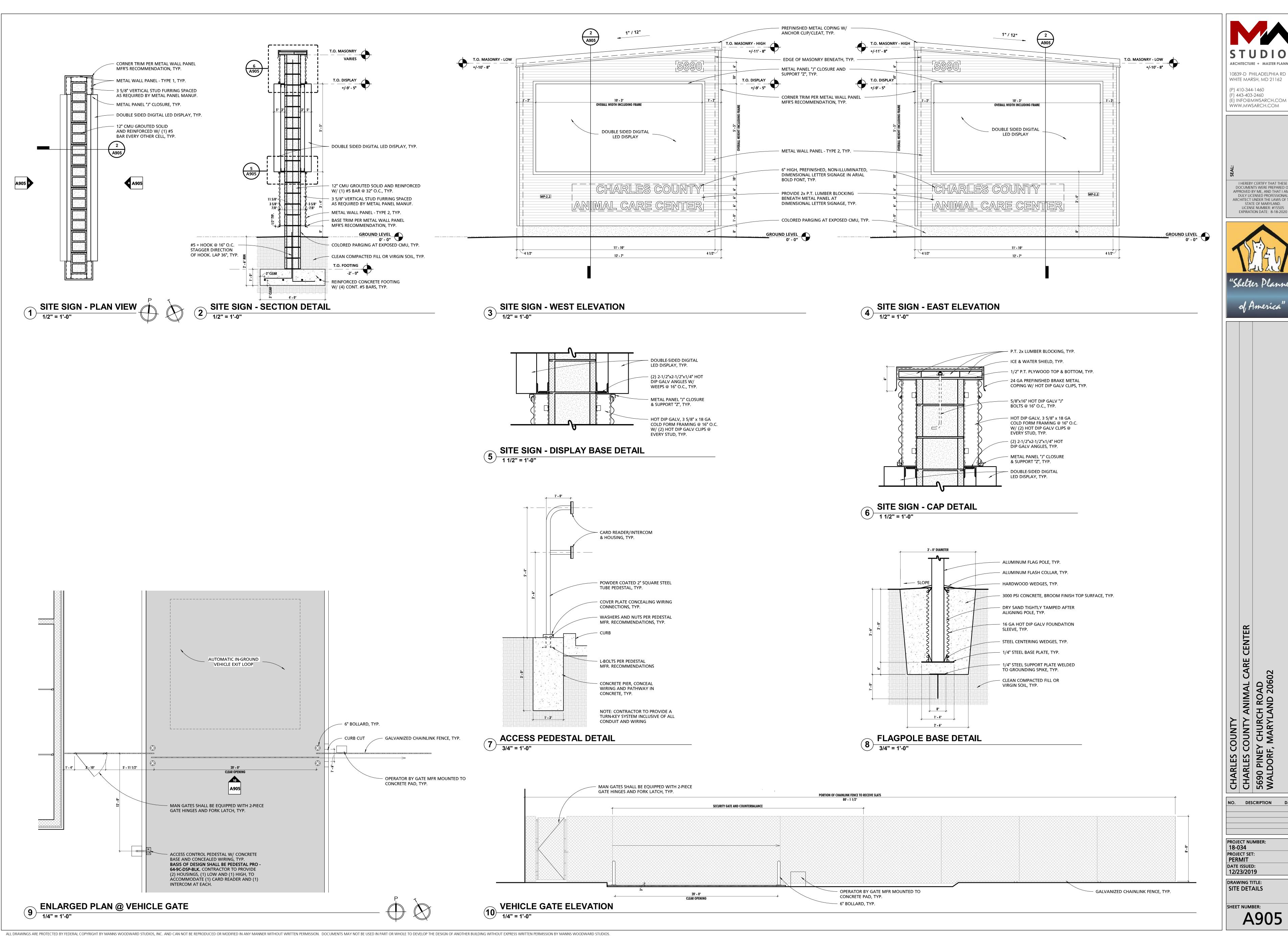
PROJECT SET: DATE ISSUED:

12/23/2019 DRAWING TITLE: REFLECTED CEILING PLAN

SHEET NUMBER:



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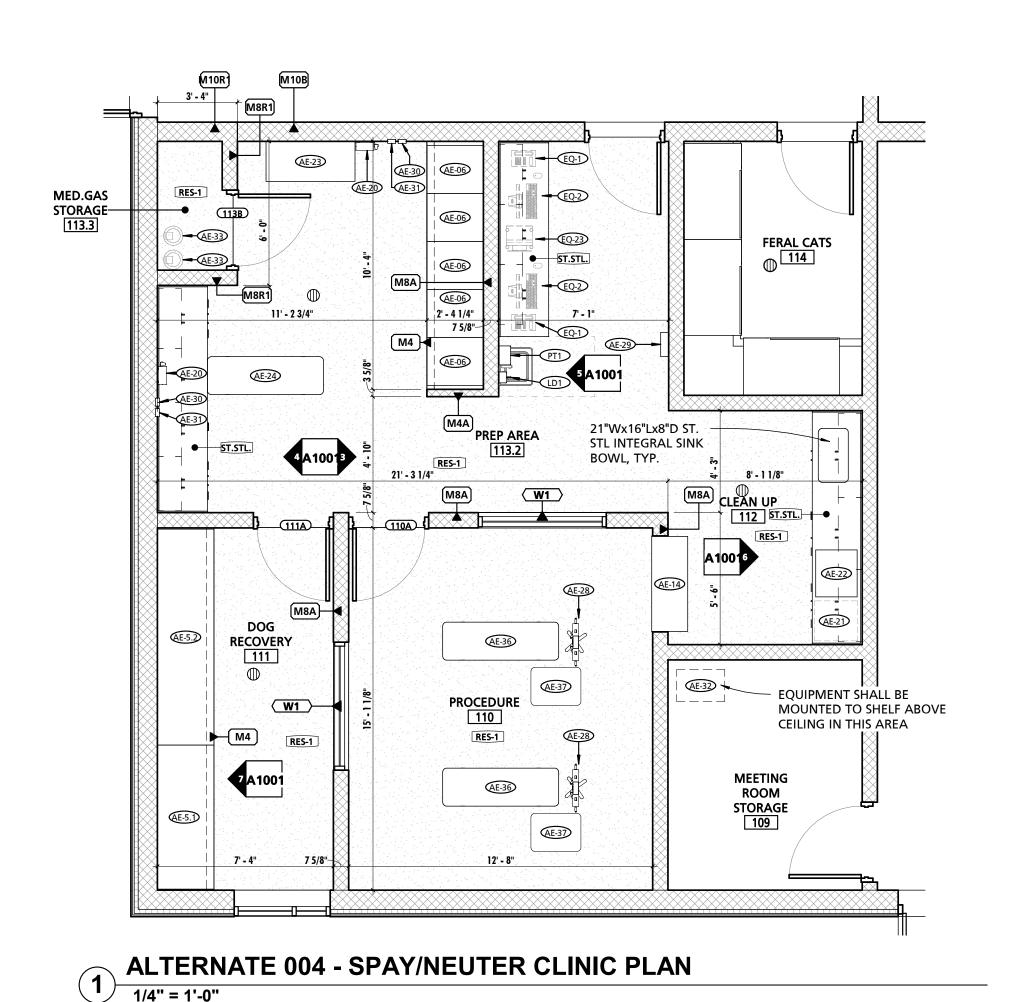


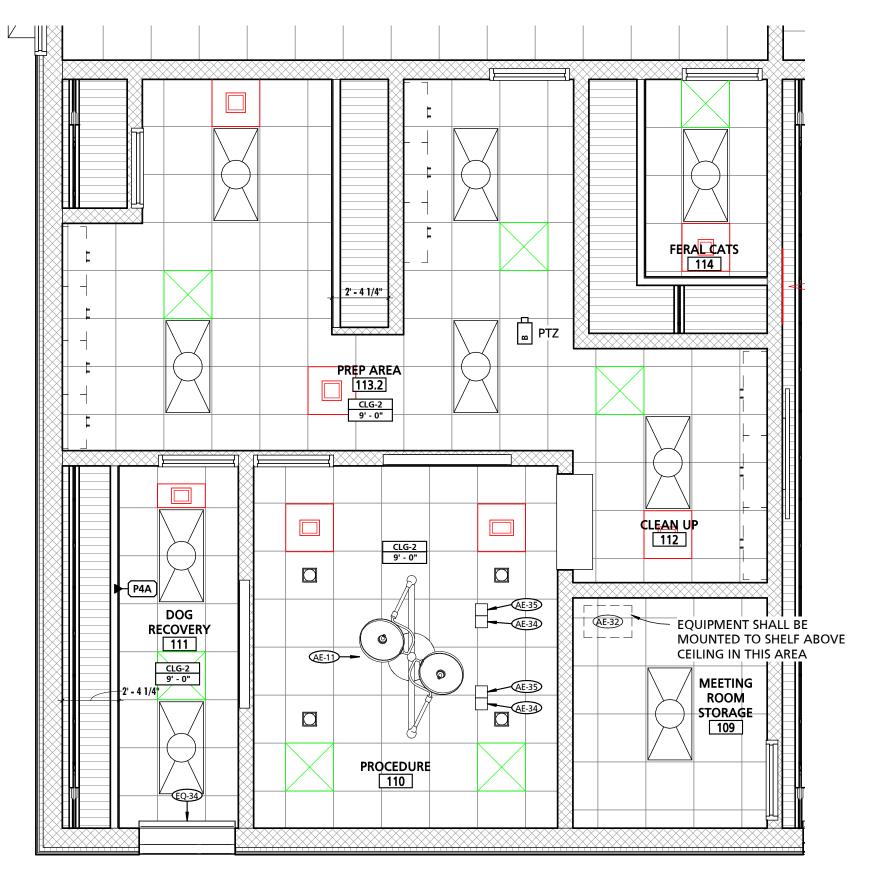
NO. DESCRIPTION DATE

PROJECT NUMBER: PROJECT SET: PERMIT DATE ISSUED:

12/23/2019 **DRAWING TITLE:** SITE DETAILS

SHEET NUMBER:





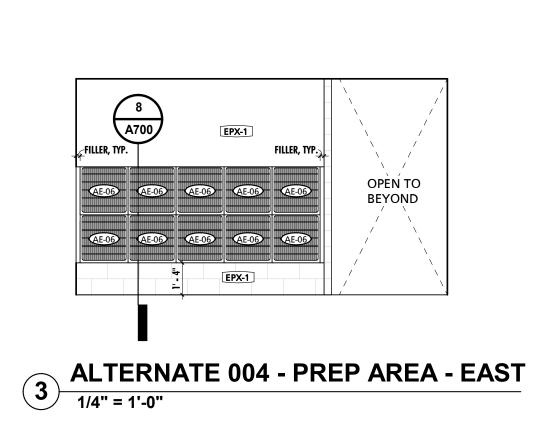
2 ALTERNATE 004 - SPAY/NEUTER CLINIC REFLECTED CEILING PLAN
1/4" = 1'-0"

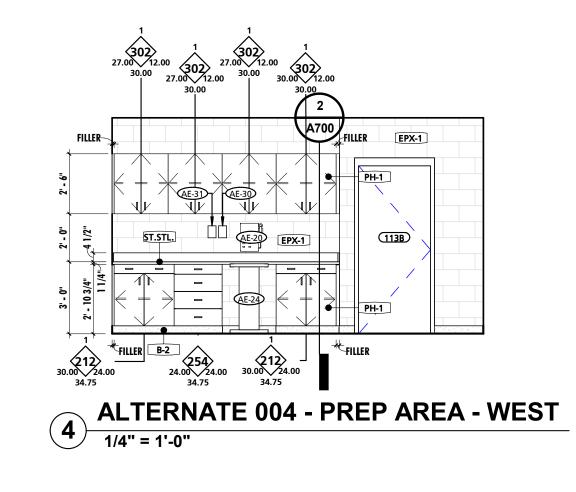
CENERAL ALTERNATE NOTES NOTE SEE SHEET A103 FOR BUILDING ASSEMBLY TYPES, NOTES & DETAILS. SEE SHEET A107 FOR FINISH NOTES & DETAILS. SEE SHEET A109 FOR FFE SCHEDULES, NOTES & DETAILS. SEE SHEET SS100 FOR ADDITIONAL SPECIALTY SYSTEM REQUIREMENTS/INFORMATION. SEE SHEET A600 SERIES FOR DOOR & WINDOW TYPES, NOTES & DETAILS.

SEE SHEET A700 FOR TYPICAL EQUIPMENT & CASEWORK DETAILS.

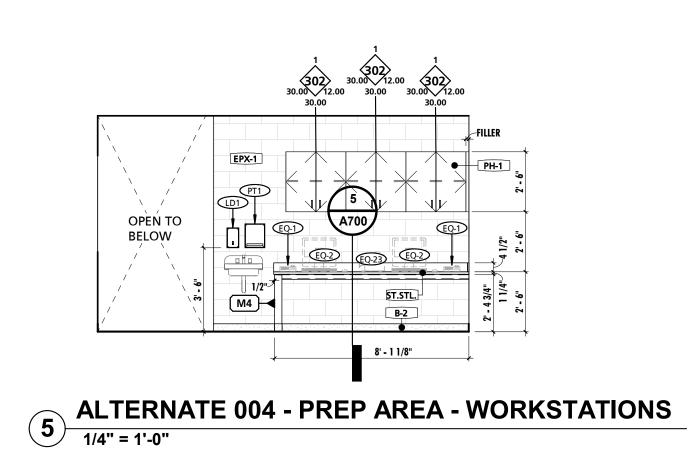
	SCHEDULE - CEILING TYPES								
MARK	DESCRIPTION	BOD MANUFACTURER	BOD MODEL	COMMENTS					
CLG-1	2x2 ACOUSTICAL CEILING TILE	USG	BASIC - FISSURED						
CLG-2	2x2 VINYL CEILING TILE	USG	CLEAN ROOM	PROVIDE GASKETED TEE FLANGES					
CLG-3	1/2" GWB OVER 3 5/8" METAL STUDS @ 16" O.C.	N/A	N/A	MOISTURE & MOLD RESISTANT GWB IN WET LOCATIONS					
CLG-4	8" NON-PERFORATED, LINEAR METAL CEILING W/ WOOD TEXTURE	ARMSTRONG	METALWORKS - LINEAR - PERFORATED	EXPOSED EDGES SHALL RECEIVE 6" AXIOM EDGE TRIM. RECESSED LIGHTING TO RECEIVE TRIM BY CLG MANUF.					
CLG-5	2x2 CERAMIC CEILING TILE	USG	RADAR CERAMIC ACOUSTICAL PANELS						
CLG-6	8" PERFORATED, LINEAR METAL SOFFIT W/ WOOD TEXTURE	ARMSTRONG	METALWORKS - LINEAR - EXTERIOR	PROVIDE COMPRESSION POSTS AS REQUIRED BY MANUF. FOR WIND UPLIFT					
CLG-7	LINEAR METAL SOFFIT	ATAS INTERNATIONAL	DWF						
CLG-8	8" PERFORATED, LINEAR METAL SOFFIT	ARMSTRONG	METALWORKS - LINEAR - EXTERIOR	PROVIDE COMPRESSION POSTS AS REQUIRED BY MANUF. FOR WIND UPLIFT					

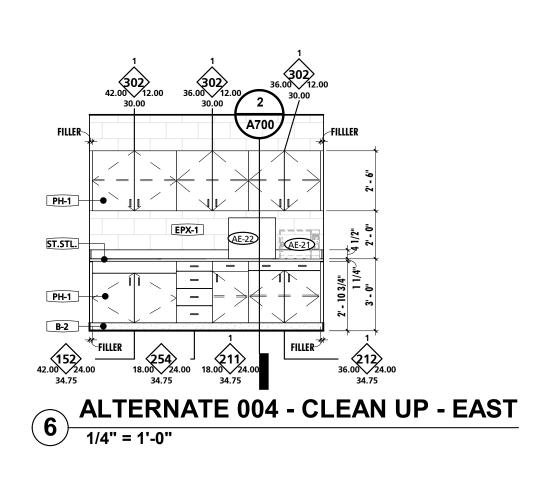
	N	1ATERIAL FIN	IISH KEY - INTEI	RIOR	
MARK	DESCRIPTION	BOD MANUFACTURER	BOD MODEL/PRODUCT LINE	COLOR SELECTION	BOD COMMENTS
B-1	4" RUBBER BASE - COLOR 1	JOHNSONITE	TRADITIONAL RUBBER BASE	DOCKSIDE	
B-2	4" RESINOUS COVE BASE	DUREX	DYMAFLAKE	ROBINS EGG W/ CUSTOM FLAKES	
B-3	6x12 CERAMIC TILE COVE BASE	CROSSVILLE	ВОНЕМІА	BEATNIK	
CONC	SEALED CONCRETE	N/A	N/A	N/A	
CT-1	12x24 CERAMIC FLOOR TILE - COLOR 1	CROSSVILLE	BOHEMIA	BEATNIK	
EPX-1	EPOXY PAINT - COLOR 1	MC CORMICK PAINTS	N/A	MOON MIST	
EPX-2	EPOXY PAINT - COLOR 2	SHERWIN-WILLIAMS	N/A	OSAGE ORAGE	
EPX-3	EPOXY PAINT - COLOR 3	SHERWIN-WILLIAMS	N/A	CITYSCAPE	
EPX-4	EPOXY PAINT - COLOR 3	SHERWIN-WILLIAMS	N/A	STAY IN LIME	
FT-#	FLOORING TRANSITION TYPE	N/A	N/A		SEE DETAIL 3/A107
HPC-1	HIGH-PERFORMANCE COATING - COLOR 1	MC CORMICK PAINTS	N/A	MOON MIST	·
LVT-1	LUXURY VINYL TILE - COLOR 1	ARMSTRONG	NATURAL CREATIONS	SPETTRO W/ BLUE HAWAIIAN MIXER	
MP-1	METAL PANEL TYPE 1 - COLOR 1	ATAS INTERNATIONAL	VERSA-LOK	STAY IN LIME SW 9032	
MP-2.1	METAL PANEL TYPE 2 - COLOR 1	ATAS INTERNATIONAL	CORRA-LOK	SLATE BLUE	
MP-2.2	METAL PANEL TYPE 2 - COLOR 2	ATAS INTERNATIONAL	CORRA-LOK	CHARCOAL GREY	
PH-1	PHENOLIC RESIN - COLOR 1	BMT/NELSON	LABORATORY CASEWORK	LIGHT GREY	
PL-1	PLASTIC LAMINATE - COLOR 1	FORMICA	N/A	FOLKSTONE	
PL-2	PLASTIC LAMINATE - COLOR 2	FORMICA	N/A	MOUSE	
PL-3	PLASTIC LAMINATE - COLOR 3	NEVAMAR	N/A	SUNKEN TREASURE	
PT-1	WALL PAINT - COLOR 1	MC CORMICK PAINTS	N/A	MOON MIST	
PT-2	WALL PAINT - COLOR 2	SHERWIN-WILLIAMS	N/A	STAY IN LIME	
RES-1	RESINOUS FLOORING	DUREX	DYMAFLAKE	ROBINS EGG W/ CUSTOM FLAKES	
RES-2	RESINOUS WALL COATING	DUREX	DYMAFLAKE	ARCTIC	
SS-1	SOLID SURFACE - COLOR 1	CORIAN	SOLID SURFACE	MINERAL	
SS-2	SOLID SURFACE - COLOR 2	FORMICA	SOLID SURFACE	BOTTLE GLASS QUARTZ 770	
SS-3	SOLID SURFACE - COLOR 3	CORIAN	SOLID SURFACE	DEEP CLOUD	
STAIN	CONCRETE STAIN & SEALER	H&C CONCRETE	INFUSION	GOLD LEAF	SEE SPECIFICATIONS FOR STAIN & SEALER
ST STL	STAINLESS STEEL COUNTERTOP				COUNTERTOP W/ MARINE EDGE AND INTEGRAL BACKSPLASH
SW-1	SLAT WALL	MARLITE	SLATWALL	WINDSOR	PROVIDE PVC EDGE TRIM
WOM	20x20 WALK-OFF CARPET TILE	MOHAWK GROUP	TUFF STUFF II	COBALT	
WT-1	12x24 CERAMIC WALL TILE - COLOR 1	CROSSVILLE	BOHEMIA	TINKER	

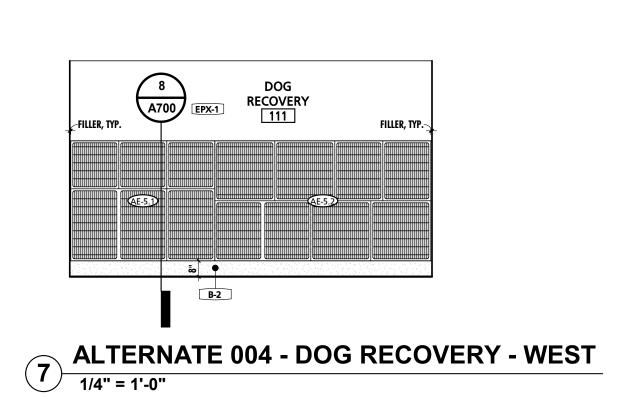




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		SCHEDULE - DOOR - ALTERNATE 004 - CLINIC FIT-OUT																							
		DO	OR PANEL						FRA	ME					FRA	ME	GLAZ	ZING		DETAILS		RA ⁻	TINGS		
							SIZE SU	MMARY	FR.4	ME PROFILE S	UMMARY	/	SIDE LITE	TRANSOM									FIRE	HARDWARE	
MARK	SIZE	ТҮРЕ	THICKNESS	MATERIAL	FINISH	FRAME TYPE	OVERALL HEIGHT	OVERALL WIDTH	DEPTH	THROAT	HEAD		WIDTH	HEIGHT	MATERIAL	FINISH	THICKNESS	TYPE	HEAD	JAMB	THRESHOLD	STC	(IN MINUTES		COMMENTS
)A	3'-0" x 7'-0"	PANEL : G	1 3/4"	HM-GALV		HM ST	7' - 4"	3' - 4"	5 7/8"	4 7/8"	4"	2"	0' - 0"	0' - 0"	HM-GALV		1/4"	GL2	H3	J3				19	
Α	3'-0" x 7'-0"	PANEL : G	1 3/4"	HM-GALV		HM ST	7' - 4"	3' - 4"	5 7/8"	4 7/8"	4"	2"	0' - 0"	0' - 0"	HM-GALV		1/4"	GL2	H3	J3				19	
3B	3'-0" x 7'-0"	PANEL : F	1 3/4"	HM-GALV		HM ST	7' - 4"	3' - 4"	5 7/8"	4 7/8"	4"	2"	0' - 0"	0' - 0"	HM-GALV		0"		Н3	J3			20	34	

SCHEDULE - FINISHES - ALTERNATE 004 - CLINIC FIT-OUT									
	ROOM INFORMATION				WA	LL FINISH			
RM #	ROOM NAME	FLOOR FINISH	BASE	NORTH	SOUTH	EAST	WEST	CEILING FINISH	REMARKS
110	PROCEDURE	RES-1	B-2	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2	
111	DOG RECOVERY	RES-1	B-2	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2	
112	CLEAN UP	RES-1	B-2	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2	
113.2	PREP AREA	RES-1	B-2	EPX-1	EPX-1	EPX-1	EPX-1	CLG-2	
113 3	MED GAS STORAGE	RFS_1	R-2	FPX-1	FPX-1	FPX-1	FPX-1	RA3	

CHARLES COUNTY ANIMAL CARE CENTE 5690 PINEY CHURCH ROAD WALDORF, MARYLAND 20602

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LICENSE NUMBER: #15505 EXPIRATION DATE: 8-18-2020

WHITE MARSH, MD 21162

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NO. DESCRIPTION DATE

PROJECT SET:
PERMIT

DATE ISSUED:
12/23/2019

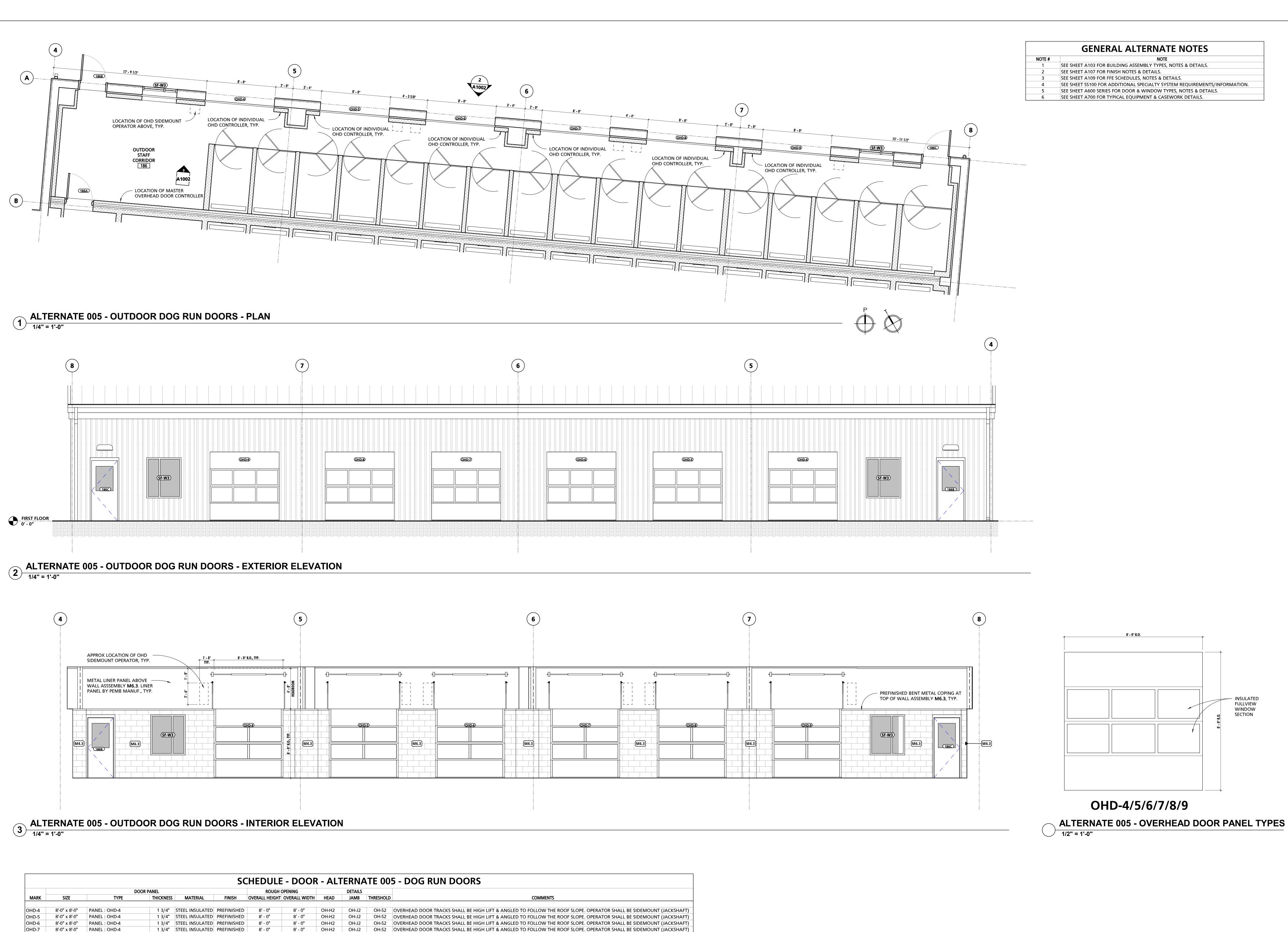
DRAWING TITLE:
ALTERNATE 004 -

PROJECT NUMBER:

SPAY/NEUTER CLINIC

SHEET NUMBER:

A 1 0 1



1 3/4" STEEL INSULATED PREFINISHED 8' - 0" 8' - 0" OH-H2 OH-J2 OVERHEAD DOOR TRACKS SHALL BE HIGH LIFT & ANGLED TO FOLLOW THE ROOF SLOPE. OPERATOR SHALL BE SIDEMOUNT (JACKSHAFT)

1 3/4" STEEL INSULATED PREFINISHED 8' - 0" 8' - 0" OH-H2 OH-J2 OH-S2 OVERHEAD DOOR TRACKS SHALL BE HIGH LIFT & ANGLED TO FOLLOW THE ROOF SLOPE. OPERATOR SHALL BE SIDEMOUNT (JACKSHAFT)

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8'-0" x 8'-0" PANEL : OHD-4

8'-0" x 8'-0" PANEL : OHD-4

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"Shelter Planne of America"

HARLES COUNTY ANIMAL CARE CENTER 690 PINEY CHURCH ROAD /ALDORF, MARYLAND 20602

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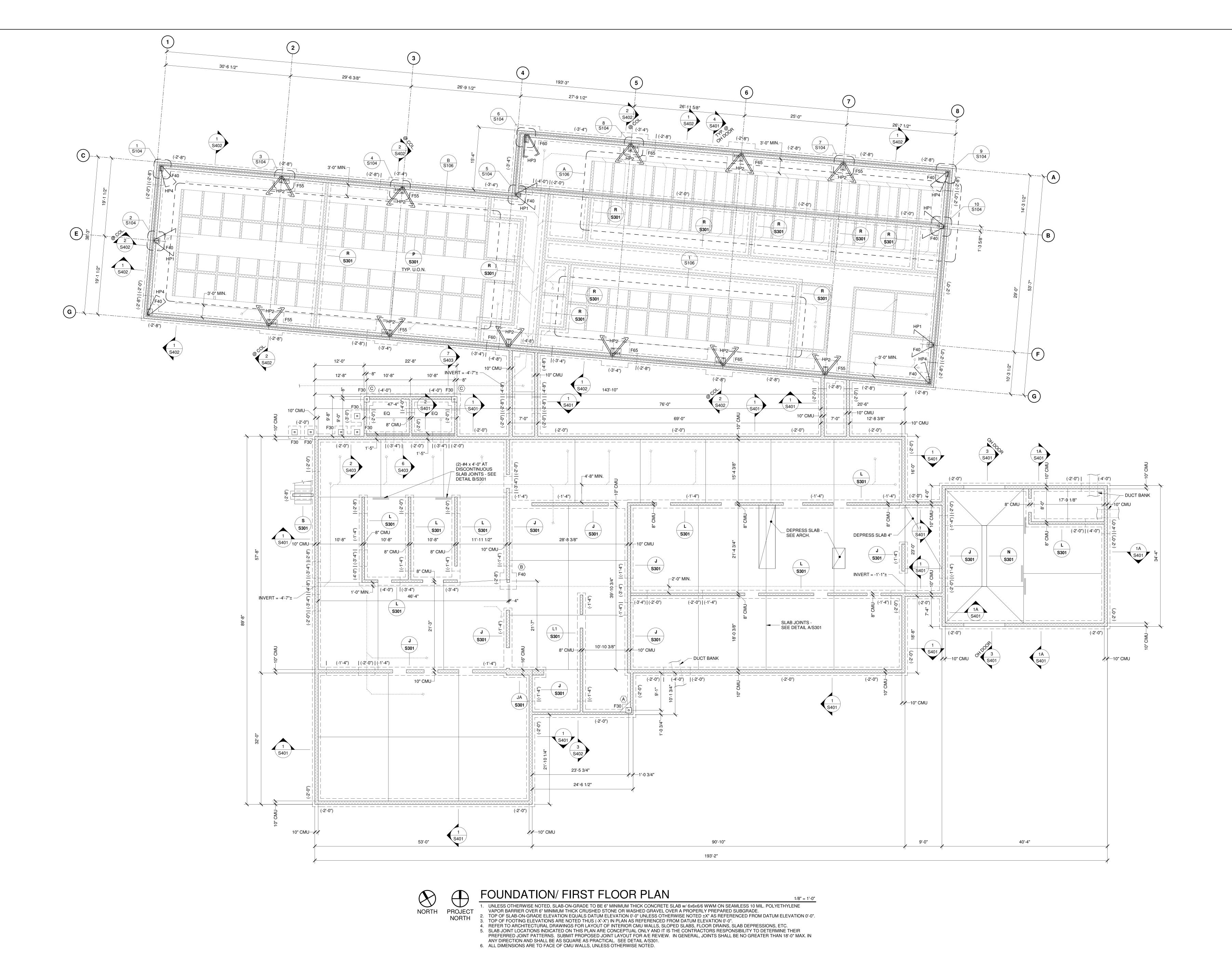
PROJECT NUMBER:
18-034
PROJECT SET:
PERMIT
DATE ISSUED:

PERMIT
DATE ISSUED:
12/23/2019

DRAWING TITLE:
ALTERNATE 005 -

ALTERNATE 005 OUTDOOR DOG RUN
DOORS
SHEET NUMBER:

A 1002



STUDIOS

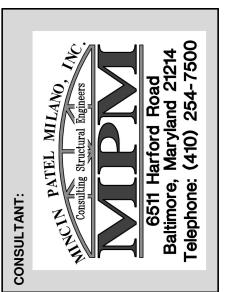
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CHARLES COUNTY ANIMAL SHELTER

CHARLES COUNTY ANIMAL SHELTER

5690 PINEY CHURCH ROAD

WALDORF, MARYLAND 20602

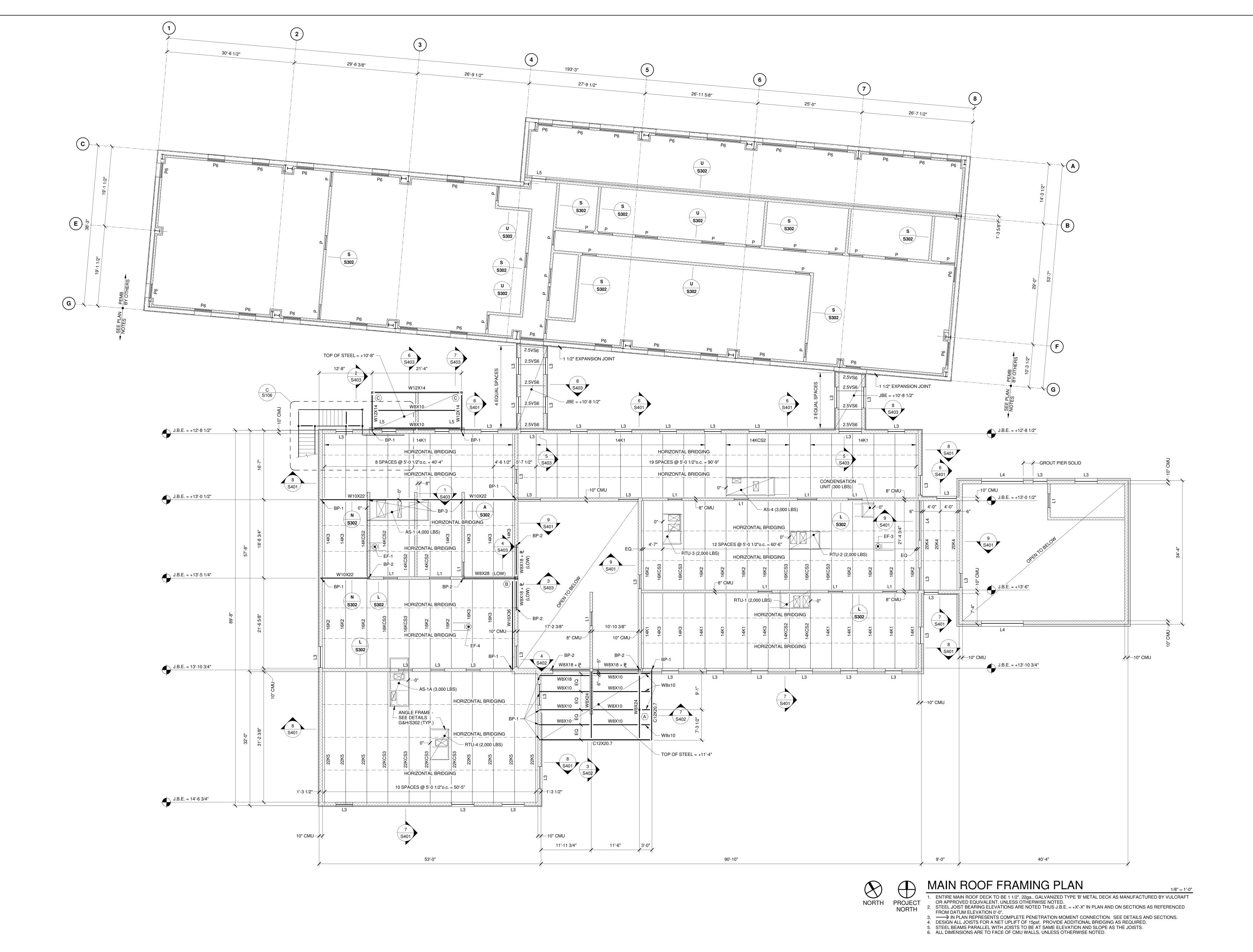
PROJECT 18-034 PROJECT PERMIT

PROJECT PERMIT DATE 12/23/2019

DRAWING FOUNDATION/ FIRST FLOOR PLAN

S101

MPM #18255



STUDIOS

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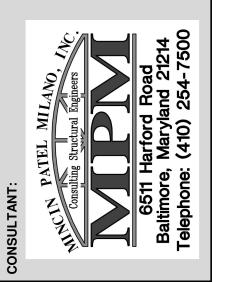
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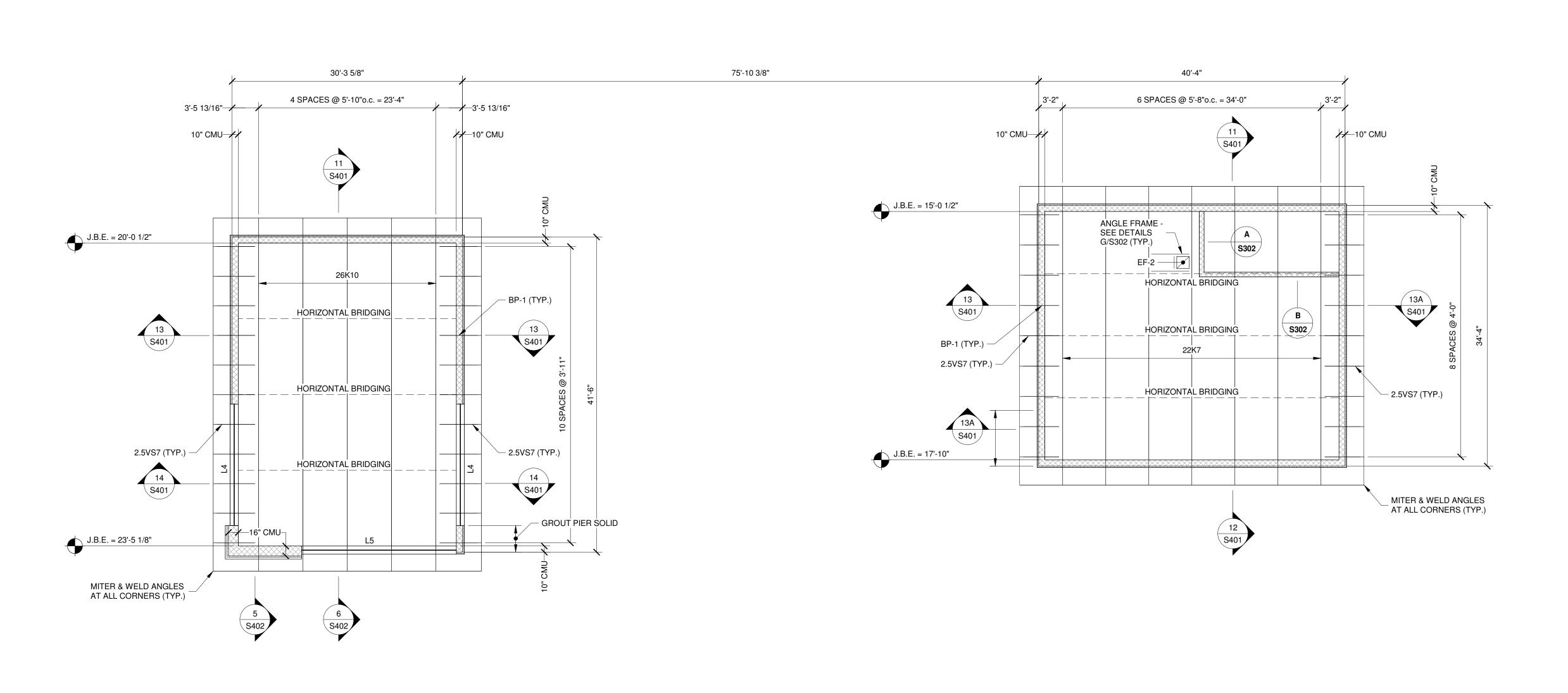
PROJECT 18-034 PROJECT PERMIT

DATE
12/23/2019

DRAWING
ROOF FRAMING PLAN

S102

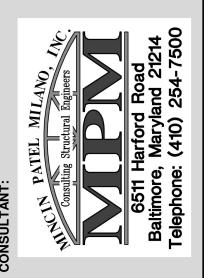
MPM #18255





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PROJECT 18-034

MPM #18255

12/23/2019

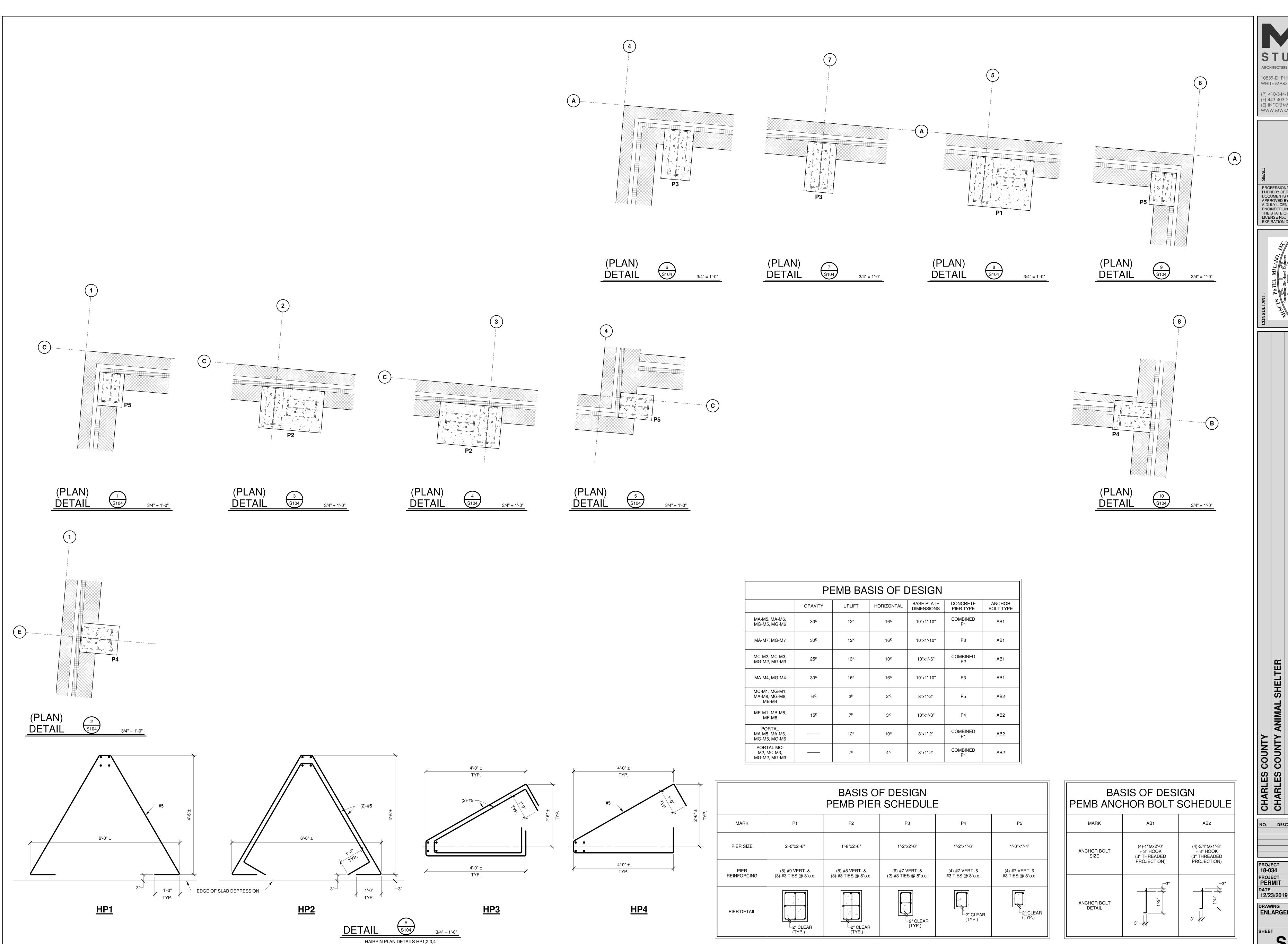
UPPER ROOF FRAMING

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UPPER ROOF FRAMING PLAN

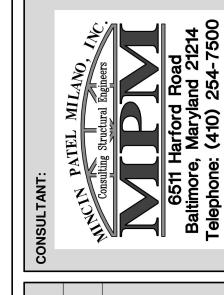
1/8" = 1'-0" ENTIRE HIGH ROOF DECK TO BE 1 1/2", 22ga., GALVANIZED TYPE 'B' METAL DECK AS MANUFACTURED BY VULCRAFT OR APPROVED EQUIVALENT, UNLESS OTHERWISE NOTED.
 DESIGN ALL JOISTS FOR A NET UPLIFT OF 15psf. PROVIDE ADDITIONAL BRIDGING AS REQUIRED. DESIGN ALL JOIST SEATS FOR AN UN-FACTORED ROLLOVER FORCE OF 500 LBS (WIND OR SEISMIC). 4. STEEL JOIST BEARING ELEVATIONS ARE INDICATED THUS J.B.E. = +X'-X" IN PLAN AND ON SECTIONS. ELEVATIONS ARE REFERENCED FROM DATUM ELEVATION 0'-0".



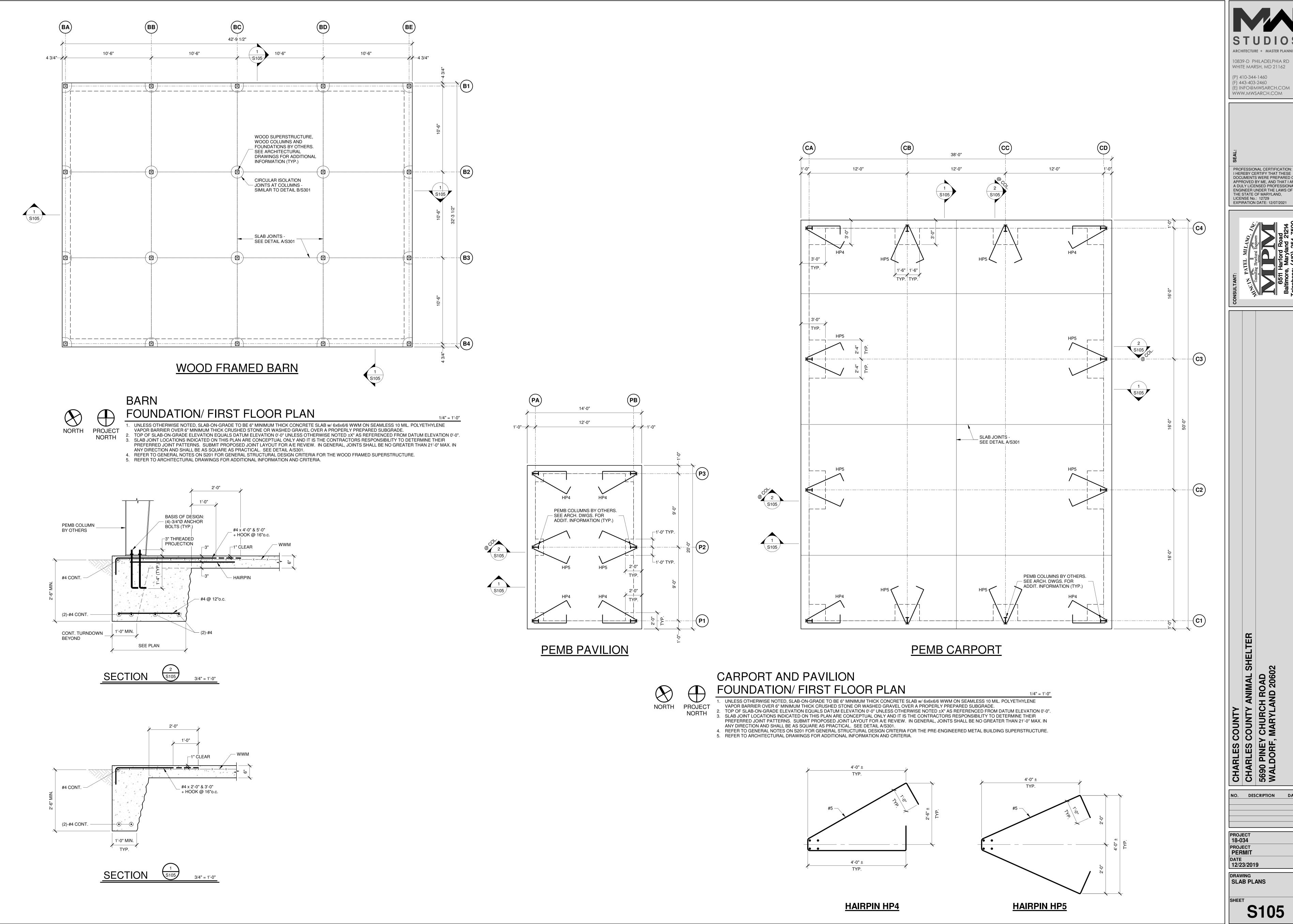
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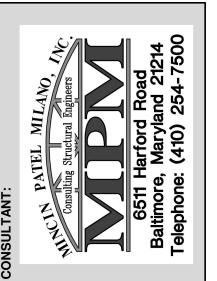


NO. DESCRIPTION DATE 12/23/2019 **ENLARGED PIERS**



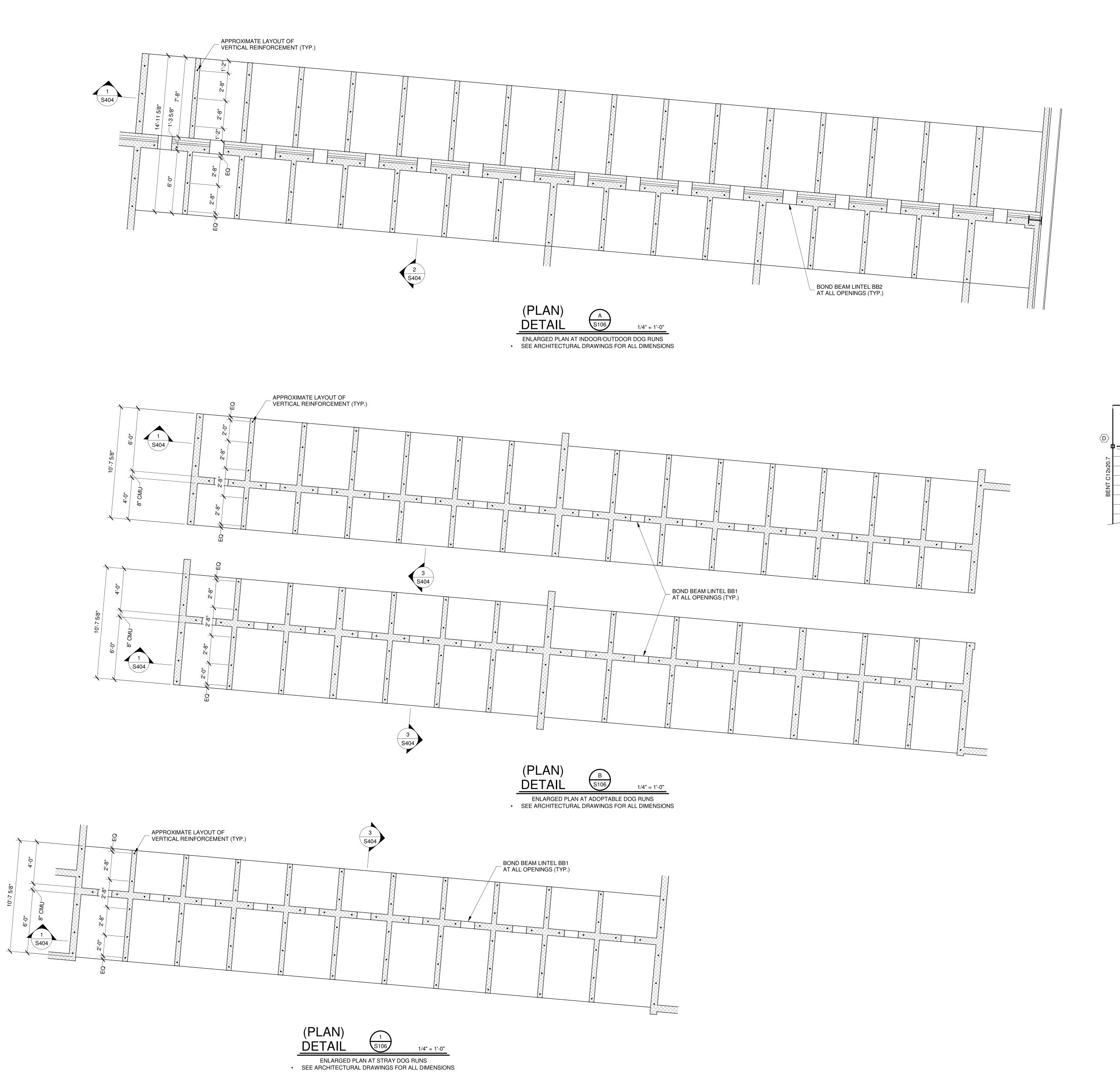
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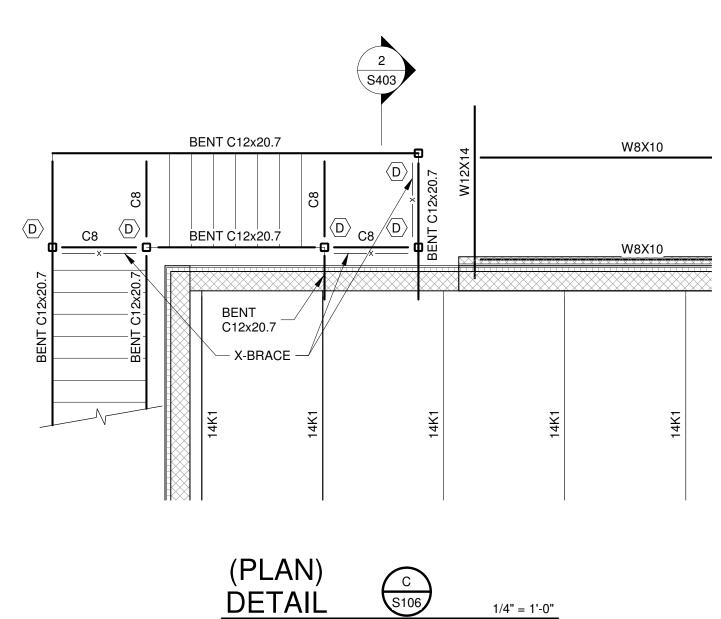
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DESCRIPTION DATE

12/23/2019 SLAB PLANS





EXTERIOR ROOF ACCESS STAIR SEE ARCHITECTURAL DRAWINGS FOR ALL DIMENSIONS
ALL EXTERIOR EXPOSED STEEL TO BE GALVANIZED

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NO. DESCRIPTION DATE

12/23/2019 ENLARGED PLANS

	LINTE	SCHEDULE	
MARK	ТҮРЕ	CONFIGURATION	REMARKS
Р	4" WIDE x 8' HIGH PRECAST MASONRY LINTEL w/ (1)-#5 T & B FOR EACH 4" OF WALL THICKNESS.		WHERE INDICATED AND FOR OPENINGS IN NON-BEARING INTERIOR PARTITIONS UP TO 5'-0" WIDE. PROVIDE 8" MINIMUN BEARING EACH END.
P6	6" WIDE x 8' HIGH PRECAST MASONRY LINTEL w/ (1)-#5 T & B		WHERE INDICATED AND FOR OPENINGS IN NON-BEARING INTERIOR PARTITIONS UP TO 5'-0" WIDE. PROVIDE 8" MINIMUM BEARING EACH END.
L1	L4x3 1/2x5/16 LLV FOR EACH 4" OF WALL THICKNESS.		WHERE INDICATED AND FOR OPENINGS UP TO 6'-0" WIDE. PROVIDE 8" MINIMUM BEARING EACH END. (GALVANIZE WHEN IN EXTERIOR WALLS)
L2	L6x3 1/2x5/16 LLV FOR EACH 4" OF WALL THICKNESS.		WHERE INDICATED AND FOR OPENINGS BETWEEN 6'-0" TO 10'-0" WIDE. PROVIDE 8" MIN. BEARING EACH END. (GALVANIZE WHEN IN EXTERIOR WALLS)
L3 L6x3 1/2x5/16 LLV + L5x5x5/16		10" CMU	WHERE INDICATED AND FOR OPENINGS IN 10" CMU WALLS. PROVIDE 8" MIN. BEARING EACH END. (GALVANIZE WHEN IN EXTERIOR WALLS)
L4	W8x21 + 8 5/8"x5/16" PLATE	10" CMU	WHERE INDICATED IN PLAN. PROVIDE BP-2 EACH END.
L5 W16x36 w/ 5/16"x8 5/8" PLATE		10" CMU	WHERE INDICATED IN PLAN. PROVIDE BP-4 EACH END.
BL1	8" DEEP x 8" WIDE CMU BOND BEAM LINTEL w/ (2)-#5, GROUT SOLID	• •	PROVIDE 8" MIN. BEARING EACH END.
BL2	8" DEEP x 16" WIDE CMU BOND BEAM LINTEL w/ (2)-#5, GROUT SOLID		PROVIDE 8" MIN. BEARING EACH END.

ALL OPENINGS IN MASONRY WALLS AND IN PARTITIONS ARE TO BE PROVIDED WITH LINTELS. LINTELS SHALL BE STRUCTURAL STEEL OR PRECAST CONCRETE AS INDICTED, UNLESS OTHERWISE NOTED. ALL LINTELS SHALL HAVE 8" MINIMUM BEARING AND SHALL BE SET IN A FULL BED OF MORTAR. SHORE LINTELS AS REQUIRED TO PREVENT ROTATION DURING CONSTRUCTION. NOTE THAT ALL WALL OPENINGS MAY NOT BE SHOWN ON THE STRUCTURAL DRAWINGS. CONTRACTOR SHALL COORDINATE SIZE, TYPE, AND LOCATION OF ALL LINTELS REQUIRED WITH ARCHITECTURAL & MECHANICAL DRAWINGS.

N	MAIN BUILD	ING COLUM	N SCHEDUL		
	A	B	©	(D)	
HIGH ROOF					
MAIN ROOF					
_CANOPY					
FLOOR	HSS4x4x1/4	HSS8x8x1/4	HSS4x4x1/4 GALVANIZED	HSS4x4x5/16 GALVANIZED	
BOTTOM OF BASE PLATE ELEVATION	-0'-7"	-0'-7"	-0'-7"	+0'-1"	
BASE PLATE	10"x3/4"x10"	9"x3/4"x14"	10"x3/4"x10"	10"x3/4"x10"	
BASE PLATE CONFIGURATION	1 1/2" TYP.	1 1/2" TYP.	1 1/2" TYP.	1 1/2" TYP.	
ANCHOR BOLTS	(4)-3/4"∅ x 1'-4" + 3" HOOK w/ 4" THREADED PROJECTION				
CONCRETE PIER SIZE & REINFORCING (IF REQUIRED)	16"x16" (4)-#7 VERT. & #3 TIES @ 8"o.c.	16"x20" (4)-#8 VERT. & #3 TIES @ 8"o.c.	16"x16" (4)-#7 VERT. & #3 TIES @ 8"o.c.	16"x16" (4)-#7 VERT. & #3 TIES @ 8"o.c.	
PIER DETAIL	2" CLEAR (TYP.)	2" CLEAR (TYP.)	2" CLEAR (TYP.)	2" CLEAR (TYP.)	

COI	COLUMN FOOTING SCHEDULE									
MARK	SIZE	BOTTOM REINFORCING								
F30	3'-0"x3'-0"x1'-0"	(3)-#5 x 2'-6" EACH WAY, BOTTOM								
F40	4'-0"x4'-0"x1'-4"	(6)-#5 x 3'-6" EACH WAY, BOTTOM								
F55	5'-6"x5'-6"x1'-4"	(7)-#6 x 5'-0" EACH WAY, BOTTOM								
F60	6'-0"x6'-0"x1'-4"	(7)-#7 x 5'-6" EACH WAY, BOTTOM								
F65	6'-6"x6'-6"x2'-0"	(8)-#7 x 6'-0" EACH WAY, BOTTOM								

STRUCTURAL GENERAL NOTES

THE CONTRACTOR SHALL CHECK AND VERIFY ALL DIMENSIONS AND CONDITIONS INDICATED ON THESE DRAWINGS AND SHALL NOTIFY THE ARCHITECT/ENGINEER OF ANY DISCREPANCIES OR POTENTIAL CONFLICTS PRIOR TO PROCEEDING WITH CONSTRUCTION. THE CONTRACTOR SHALL USE ARCHITECTURAL DRAWINGS FOR LAYOUT PURPOSES. COORDINATE THE LOCATION OF ALL WALLS, ETC. WITH ARCHITECTURAL DRAWINGS.

THE BUILDING IS DESIGNED TO BE SELF-SUPPORTING AND STABLE AFTER THE BUILDING IS FULLY COMPLETED. CONSTRUCTION MEANS AND METHODS ARE SOLELY THE CONTRACTOR'S RESPONSIBILITY. THE CONTRACTOR MUST DETERMINE ERECTION PROCEDURE AND SEQUENCE,

WHICH WILL ENSURE THE STABILITY OF THE BUILDING, IT'S COMPONENT PARTS, AND TEMPORARY OR INCOMPLETE CONNECTIONS DURING ERECTION, INCLUDING THE ADDITION OF ANY SHORING, SHEETING, TEMPORARY GUYS, BRACING, TIEDOWNS, ETC. THAT MAY BE NECESSARY. SUCH MATERIAL AND METHODS ARE NOT SHOWN IN THE CONTRACT DRAWINGS OR SPECIFICATIONS AND ARE SOLELY THE RESPONSIBILITY OF THE CONTRACTOR. THE ENGINEER HAS NO EXPERTISE IN, AND TAKES NO RESPONSIBILITY FOR, THE CONSTRUCTION MEANS AND METHODS OR JOB SITE SAFETY DURING CONSTRUCTION. PROCESSING OR APPROVING SUBMITTALS MADE BY THE CONTRACTOR WHICH MAY CONTAIN INFORMATION RELATED TO CONSTRUCTION METHODS OR SAFETY ISSUES, OR PARTICIPATION IN MEETINGS WHERE SUCH ISSUES MIGHT BE DISCUSSED. SHALL NOT BE CONSTRUED AS VOLUNTARY ASSUMPTION BY THE ENGINEER OF ANY RESPONSIBILITY FOR CONSTRUCTION METHODS AND/OR SAFETY PROCEDURES. IT IS SOLELY THE RESPONSIBILITY OF EACH CONTRACTOR TO FOLLOW ALL APPLICABLE SAFETY PROCEDURES. IT IS SOLELY THE RESPONSIBILITY OF EACH CONTRACTOR TO FOLLOW ALL APPLICABLE SAFETY CODES AND REGULATIONS DURING ALL PHASES OF CONSTRUCTION. THE STRUCTURAL ENGINEER DOES NOT ENGAGE IN AND DOES NOT SUPERVISE CONSTRUCTION.

THE CONTRACTOR SHALL VERIFY/COORDINATE FLOOR SLOPES, ROOF, AND WALL OPENINGS, DUCT AND PIPE OPENINGS, EQUIPMENT PADS, ETC. WITH THE ARCHITECTURAL AND MECHANICAL DRAWINGS.

A SUBSURFACE EXPLORATION PROGRAM AND GEOTECHNICAL ENGINEERING EVALUATION HAS BEEN PERFORMED BY ECS MID-ATLANTIC, LLC TO ASSIST THE DESIGN TEAM IN THE PREPARATION OF THESE DOCUMENTS. THEIR REPORT, DATED APRIL 16, 2019, IS AVAILABLE TO CONTRACTORS FOR INFORMATIONAL PURPOSES ONLY AND DOES NOT RELIEVE THE CONTRACTORS OF THEIR RESPONSIBILITIES TO CONDUCT THEIR OWN INDIVIDUAL TAILORED STUDY TO ASSESS SUBSURFACE CONDITIONS. BASED UPON THE GEOTECHNICAL ENGINEERING REPORT. THE NEW STRUCTURE MAY BE SUPPORTED ON CONVENTIONAL SPREAD FOOTINGS FOUNDED UPON FIRM NATURAL SOILS AND APPROVED NEW CONTROLLED STRUCTURAL FILL. AN ALLOWABLE SOIL BEARING CAPACITY OF 2,500psf HAS BEEN USED FOR FOUNDATION DESIGN. NOTE THAT SOME UNDERCUTTING OF POOR FILL/POSSIBLE FILL SOIL CONDITIONS SHOULD BE EXPECTED AT THE TIME OF SITE PREPARATION AND FOUNDATION CONSTRUCTION. PERIMETER FOOTINGS SHALL BE CONSTRUCTED AT LEAST 3'-0" BELOW ADJACENT EXTERIOR GRADES FOR FROST PROTECTION. A MODULUS OF SUBGRADE REACTION K=150pci HAS BEEN USED FOR SLAB DESIGN. ALL EARTHWORK OPERATIONS SHALL BE

MONITORED BY AN APPROVED GEOTECHNICAL INSPECTION AGENCY. OPERATIONS INCLUDE:

REMOVE TOP SOIL, ALL UNSUITABLE EXISTING FILL, SOFT/LOOSE SOILS CONTAINING ORGANICS, EXISTING STRUCTURES, UTILITIES, ASPHALT, CONCRETE, AND ANY OTHER DELETERIOUS NON-SOIL MATERIALS FROM THE BUILDING AREA AND 10'-0" BEYOND. AFTER INITIAL STRIPPING OPERATION, THE SITE SHOULD BE EVALUATED BY THE GEOTECHNICAL ENGINEERING INSPECTION AGENCY AND THE SITE SHOULD BE PROOFROLLED. THE PROOFROLLING OPERATIONS SHOULD BE PERFORMED USING A 20 TO 30 TON LOADED DUMP TRUCK OR ANOTHER PNEUMATIC-TIRE VEHICLE OF SIMILAR SIZE AND WEIGHT. ANY POCKETS OF SOFT OR LOOSE SOILS SHOULD BE UNDERCUT AS DIRECTED BY THE GEOTECHNICAL INSPECTION AGENCY TO EXPOSE FIRM, STABLE CONDITIONS, OR IF CONDITIONS PERMIT, DENSIFIED IN PLACE BY VIBRATING ROLLERS. NOTE THAT GROUNDWATER WAS NOT ENCOUNTERED DURING BORING OPERATION. HOWEVER, CONTRACTOR SHOULD MAINTAIN NECESSARY GRADES TO ALLOW DRAINAGE OF GROUNDWATER TO SUMP PITS AND PUMPS TO MAINTAIN A DRY EXCAVATION SHOULD GROUNDWATER BE ENCOUNTERED.

CONTROLLED STRUCTURAL FILL ALL STRUCTURAL FILL MATERIALS SHOULD BE APPROVED BY A GEOTECHNICAL ENGINEER PRIOR TO PLACEMENT. STRUCTURAL FILL MAY CONSIST OF NON-ORGANIC ON-SITE SOILS OR OFFSITE BORROW SOILS HAVING A CLASSIFICATION OF GW, GP, GM, SW, SP. SM. SC. OR ML AS DEFINED BY THE UNIFIED SOIL CLASSIFICATION SYSTEM (USCS). ANY STRUCTURAL FILL REQUIRED SHOULD BE PLACED IN LOOSE LIFTS NOT TO EXCEED 8 INCHES AND EACH LIFT SHOULD BE COMPACTED TO AT LEAST 95 PERCENT MAXIMUM DENSITY AS DETERMINED BY THE STANDARD PROCTOR TEST (ASTM D 698). THE SUBGRADE IN ALL FILL AREAS SHOULD ALSO BE COMPACTED TO A FIRM, STABLE CONDITION PRIOR TO PLACEMENT OF THE FILL. FILL PLACEMENT BELOW SLABS SHALL EXTEND A MINIMUM OF 10 FEET HORIZONTALLY BEYOND THE EDGE OF EACH STRUCTURE. FILL UNDER FOUNDATIONS SHOULD EXTEND BEYOND THE EDGE OF THE FOUNDATIONS AS INDICATED ON DETAILS.

MOISTURE CONTENTS OF STRUCTURAL FILLS SHOULD IDEALLY BE MAINTAINED WITHIN ±2 PERCENTAGE POINTS OF OPTIMUM, THUS ADJUSTMENTS TO THE NATURAL MOISTURE CONTENTS OF THE SOILS MAY BE REQUIRED IN ORDER TO OBTAIN SPECIFIED COMPACTION LEVELS. NOTE THAT ON-SITE MOISTURE CONTENTS OF THE SHALLOW SOILS AT THE SITE WILL DEPEND ON SEASONAL CONDITIONS AT THE TIME OF CONSTRUCTION. SOME OF THE EXISTING FILL/POSSIBLE FILL USED AS STRUCTURAL FILL MAY HAVE MOISTURE CONTENTS SOMEWHAT HIGHER THAN OPTIMUM REQUIRING SOME DRYING PRIOR TO USING THESE SOILS FOR GRADING PURPOSES.

ALL SUBGRADE PREPARATION, FILL PLACEMENT, AND COMPACTION OPERATIONS MUST BE MONITORED BY A QUALIFIED INDEPENDENT GEOTECHNICAL INSPECTION AGENCY UNDER THE SUPERVISION OF A GEOTECHNICAL ENGINEER. THIS INSPECTION SHOULD BE ON A FULL-TIME BASIS TO ENSURE THAT FILL MATERIALS ARE BEING PLACED AND COMPACTED IN COMPLIANCE WITH THE PROJECT REQUIREMENTS. A SUFFICIENT NUMBER OF IN-PLACE DENSITY TESTS SHOULD BE PERFORMED TO VERIFY THAT THE PROPER DEGREE OF COMPACTION IS BEING OBTAINED.

WHERE CONSTRUCTION TRAFFIC OR WEATHER HAS DISTURBED THE SUBGRADE. THE UPPER 8 INCHES OF SOIL INTENDED FOR STRUCTURAL SUPPORT SHOULD BE SCARIFIED AND RE-COMPACTED. EACH LIFT OF FILL SHOULD BE TESTED IN ORDER TO CONFIRM THAT THE RECOMMENDED DEGREE OF COMPACTION IS ATTAINED.

FOUNDATION CONSTRUCTION ALL FOOTING SUBGRADES SHOULD BE OBSERVED, EVALUATED, AND VERIFIED FOR THE DESIGN BEARING PRESSURE BY THE GEOTECHNICAL ENGINEER AFTER EXCAVATION AND PRIOR TO REINFORCEMENT STEEL AND CONCRETE PLACEMENT. IF LOW BEARING SOIL IS ENCOUNTERED DURING FOUNDATION CONSTRUCTION, LOCALIZED UNDERCUTTING AND/OR IN-PLACE STABILIZATION OF FOOTING SUBGRADES WILL BE REQUIRED. THE ACTUAL NEED FOR, AND EXTENT OF, UNDERCUTTING SHOULD BE BASED ON FIELD OBSERVATIONS

EXCAVATIONS FOR FOOTINGS SHOULD BE MADE IN SUCH A WAY SO AS TO PROVIDE BEARING SURFACES THAT ARE FIRM, LEVEL, AND FREE OF LOOSE, SOFT, WET OR OTHERWISE UNSUITABLE SOILS. FOUNDATION CONCRETE SHOULD NOT BE PLACED ON FROZEN OR SATURATED SUBGRADES. FOUNDATION EXCAVATIONS SHOULD BE CONCRETED AS SOON AS PRACTICAL AFTER THEY ARE EXCAVATED. IF AN EXCAVATION IS LEFT OPEN FOR AN EXTENDED PERIOD. A THIN MAT OF LEAN CONCRETE SHOULD BE PLACED OVER THE BOTTOM TO MINIMIZE DAMAGE TO THE BEARING SURFACE FROM WEATHER OR CONSTRUCTION ACTIVITIES. WATER SHOULD NOT BE ALLOWED TO POND IN ANY EXCAVATION.

CAST IN PLACE CONCRETE AND REINFORCING

ALL CONCRETE SHALL CONFORM TO ACI 301, ACI 318, ACI 315. ALL CONCRETE SHALL BE NORMAL WEIGHT CONCRETE AND HAVE THE FOLLOWING 28 DAY COMPRESSIVE STRENGTH (f'c): SLAB-ON-GRADE: 4.000psi

EXTERIOR EXPOSED CONCRETE SUBJECT TO DE-ICERS: 4,500psi ALL OTHER CONCRETE: 3,000psi

CEMENTITIOUS MATERIAL SHALL BE MINIMUM 75% PORTLAND CEMENT ASTM C150, TYPE I OR TYPE II. CALCIUM CHLORIDE IS NOT ALLOWED.

AND TESTS MADE BY THE GEOTECHNICAL ENGINEER AT THE TIME OF CONSTRUCTION.

GROUT FOR MASONRY FILL: 3,000psi PEA GRAVEL CONCRETE OR GROUT PER ASTM C476 REINFORCING - ASTM A 615, GRADE 60

WELDED WIRE FABRIC - ASTM A 185 SPLICE LAPS FOR ALL REINFORCING SHALL BE CLASS "B" SPLICE ALL CONCRETE OTHER THAN FOOTINGS SHALL CONTAIN A WATER-REDUCING ADMIXTURE PER MANUFACTURER'S RECOMMENDATIONS. ALL EXTERIOR CONCRETE INCLUSIVE OF WALL PANELS SHALL BE AIR-ENTRAINED 4-6%. MAXIMUM SLUMP TO BE 4".

MASONRY WORK SHALL COMPLY WITH ACI530.1/ASCE 6 "SPECIFICATIONS FOR MASONRY STRUCTURES." CONCRETE MASONRY UNITS SHALL CONFORM TO ASTM C 90. CONCRETE MASONRY UNITS SHALL HAVE A MINIMUM COMPRESSIVE STRENGTH OF 1,900 PSI AND A MINIMUM PRISM STRENGTH (F'm) OF 1,500 PSI. MORTAR SHALL CONFORM TO ASTM C 270, TYPE S FOR ALL CMU WALLS AND TYPE N FOR VENEERS. ALL MASONRY WALLS SHALL BE CONTINUALLY REINFORCED WITH LADDER TYPE HORIZONTAL JOINT REINFORCEMENT AT 16" CENTER TO CENTER VERTICALLY MINIMUM AND ALL INTERSECTIONS OF WALLS AND CORNERS SHALL BE PROVIDED WITH PREFABRICATED 'T' AND CORNER PIECES. VERTICAL MASONRY REINFORCEMENT SHALL BE AS NOTED ON SCHEDULE AND SECTIONS. REINFORCED WALLS SHALL HAVE CELLS FILLED SOLID WITH GROUT IN FOUR COURSE MAXIMUM LIFTS. PROVIDE HOLES IN BOTTOM OF EACH LIFT TO ENSURE WALL IS FILLED SOLID. SPLICE LAPS FOR VERTICAL WALL REINFORCING SHALL BE 48 BAR DIAMETERS, UNLESS OTHERWISE NOTED. PROVIDE CONTROL JOINTS IN ALL ABOVE GRADE MASONRY WALLS AT 30' ON CENTER, MAXIMUM, UNLESS OTHERWISE NOTED.

ALL OPENINGS IN MASONRY WALLS AND PARTITIONS ARE TO BE PROVIDED WITH LINTELS. LINTELS SHALL BE STRUCTURAL STEEL OR PRECAST CONCRETE AS INDICATED IN THE LINTEL SCHEDULE. ALL LINTELS SHALL HAVE 8" MINIMUM BEARING AND SHALL BE SET IN A FULL BED OF MORTAR. SHORE LINTELS AS REQUIRED TO PREVENT ROTATION DURING CONSTRUCTION. NOTE THAT ALL WALL OPENINGS MAY NOT BE SHOWN ON THE STRUCTURAL DRAWINGS. CONTRACTOR SHALL COORDINATE SIZE, TYPE AND LOCATION OF ALL LINTELS REQUIRED WITH ARCHITECTURAL AND MECHANICAL DRAWINGS.

STRUCTURAL STEEL

FABRICATION AND ERECTION OF STRUCTURAL STEEL SHALL CONFORM TO AISC SPECIFICATIONS AND AWS D1.1 ALL STRUCTURAL STEEL SHALL CONFORM TO THE FOLLOWING:

W-SHAPES: ASTM A992, GRADE 50.

MISC. SHAPES: ASTM A36 TUBE STEEL: ASTM A500, GRADE B. PIPES: ASTM A53. GRADE B.

> WELDING ELECTRODES: E70XX HIGH STRENGTH BOLTS: ASTM A 325. ANCHOR BOLTS: ASTM F1554 GRADE 36

STEEL DECK - ASTM A 653 (SQ), GRADE 33

STEEL JOISTS

ALL JOISTS SHALL CONFORM TO THE STANDARD SPECIFICATIONS FOR OPEN WEB STEEL JOISTS AS ADOPTED BY THE STEEL JOIST INSTITUTE AND AISC. ALL LOADS OTHER THAN CEILING AND LIGHT FIXTURES SHALL BE SUPPORTED FROM HEADERS FRAMED BETWEEN PANEL POINTS.

FABRICATION AND ERECTION OF STEEL DECK SHALL CONFORM TO STEEL DECK INSTITUTE SPECIFICATIONS.

PROVIDE STEEL ANGLE SUPPORT FRAME AT ALL OPENINGS GREATER THAN 12" IN EITHER DIRECTION.

GALVANIZING - ASTM A 924, G 90 GALVANIZED COATING. PLACE DECK IN ACCORDANCE WITH MANUFACTURER'S RECOMMENDATIONS.

FASTEN TYPE B DECK TO ALL SUPPORTS w/ 5/8" PUDDLE WELDS OR APPROPRIATE HILTI X-HSN 24 OR X-ENP-19 ANCHORS @ 12"o.c. (36/4 PATTERN) FASTEN SIDE LAPS AT 2'-0". NO LOADS SHALL BE SUSPENDED FROM METAL DECK.

STEEL STAIRS AND RAILING SYSTEMS THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE DESIGN, FABRICATION, AND ERECTION OF THE STEEL STAIRS AND RAILING SYSTEMS.

STAIR AND RAILING FRAMING SHALL BE DESIGNED FOR APPLICABLE CODE REQUIREMENTS.

PRE-ENGINEERED METAL BUILDING (PEMB) THE DESIGN, FABRICATION AND ERECTION OF ALL PRE-ENGINEERED METAL BUILDING COMPONENTS AND THEIR CONNECTIONS SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR. FOUNDATIONS HAVE BEEN PROPORTIONED BASED UPON COLUMN REACTIONS DETERMINED FROM INFORMATION PROVIDED BY NUCOR BUILDING SYSTEMS GROUP. ANY FOUNDATION REDESIGN REQUIRED DUE TO DIFFERING COLUMN REACTIONS/BASE PLATE AND/OR ANCHOR BOLT CONDITIONS SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR.

DESIGN CRITERIA FOR THE PRE-ENGINEERED METAL BUILDING SHALL BE AS OUTLINED UNDER THE 'LIVE LOADS' SECTION OF THESE GENERAL NOTES AND THE PEMB DRAWINGS.

COLD-FORMED METAL FRAMING

THE DESIGN, FABRICATION, AND INSTALLATION OF ALL LIGHTGAUGE FRAMING AND THEIR CONNECTIONS SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR. THE LIGHTGAUGE FRAMING COMPONENTS INDICATED ON STRUCTURAL DRAWINGS SHALL BE IN ACCORDANCE WITH ASTM 653. MINIMUM STUD SIZES AND GAUGES ARE INDICATED ON THE DRAWINGS. ALL LIGHTGAUGE MATERIALS SHALL BE GALVANIZED IN ACCORDANCE WITH ASTM A924 WITH A MIN. G60 COATING. THE MINIMUM YIELD STRENGTH OF THE LIGHTGAUGE METAL STUD FRAMING COMPONENTS SHALL BE AS FOLLOWS: 16 GAUGE AND HEAVIER - ASTM A653 SQ, GRADE 50

18 GAUGE AND LIGHTER - ASTM A653 SQ, GRADE 33

ALL CONNECTIONS SHALL BE WELDED, SCREWED, OR POWDER ACTUATED FASTENED AS INDICATED ON THESE DRAWINGS • SCREWS - #10 SELF DRILLING SCREWS MANUFACTURED BY HILTI AND INSTALLED PER THE FASTENER MANUFACTURER'S SPECIFICATIONS. MINIMUM 1/2" LENGTH FOR LIGHTGAUGE TO LIGHTGAUGE CONNECTIONS. SCREWS SHALL BE PLACED A MINIMUM OF 1/2" BETWEEN ADJACENT SCREWS AND FROM METAL EDGES. POWDER ACTUATED FASTENERS (P.A.F.) - 0.157" SHANK DIAMETER x 1 1/4" LONG P.A.F. HILTI TYPE X-U UNIVERSAL KNURLED SHANK FASTENERS, INSTALLED PER THE MANUFACTURER'S SPECIFICATIONS FOR LIGHTGAUGE CONNECTIONS TO CONCRETE OR STEEL. FASTENERS SHALL BE SPACED A MINIMUM 3" FROM CONCRETE EDGES. MINIMUM P.A.F. EMBEDMENT IN CONCRETE SHALL BE 1 1/8". • FASTENERS SHALL BE SPACED A MINIMUM OF 1 1/2" BETWEEN ADJACENT P.A.F. IN STRUCTURAL STEEL AND A MINIMUM OF 1 1/2" FROM STEEL

EDGES. THE P.A.F. POINT SHALL BE DRIVEN COMPLETELY THROUGH THE BACK SIDE OF THE STRUCTURAL STEEL MEMBER. MASONRY ANCHORS - 1/4" DIAMETER x 2" LONG SELF DRILLING SCREW ANCHORS AS MANUFACTURED BY TAPCON, HILTI (KWIK CON II) OR RAWL. INSTALL FASTENERS ACCORDING TO THE FASTENER MANUFACTURER'S SPECIFICATIONS FOR LIGHTGAUGE CONNECTIONS TO

DO NOT CUT OR SPLICE LIGHTGAUGE FRAMING MEMBERS. DO NOT BEAR OR CONNECT LIGHTGAUGE MEMBERS WITHIN TWELVE INCHES OF THE PUNCHED OPENING IN THE MEMBER WEBS, UNLESS THE MEMBERS ARE REINFORCED WITH A MINIMUM 18" LONG UNPUNCHED TRACK OR STUD AT THE PUNCH OPENING. THE TRACK OR STUD REINFORCING PIECE SHALL BE THE SAME SIZE AND GAUGE AS THE PUNCHED MEMBER. FASTEN THE REINFORCING PIECE TO THE MEMBER WITH A MINIMUM OF FOUR SCREWS. THE CONTRACTOR SHALL PROVIDE LIGHTGAUGE MEMBERS AT THE SIZE AND SPACING INDICATED ON THESE DRAWINGS. LARGER SIZES AND/OR CLOSER SPACING MAY BE SUBSTITUTED PROVIDED THE SUBSTITUTIONS ARE COORDINATED WITH THE ARCHITECTURAL DRAWINGS.

LIGHTGAUGE FRAMING SHALL BE DESIGNED TO COMPLY WITH THE FOLLOWING CRITERIA. WIND LOAD: PER IBC CRITERIA FOR COMPONENTS & CLADDING AND SCHEDULE BELOW

EXPOSURE B PROVIDE CONTINUOUS BRIDGING IN ALL WALLS AT A MAX. OF 5'-0"o.c. OR CLOSER IF REQUIRED BY DESIGN, SEE DETAILS.

THE DESIGN, FABRICATION, AND ERECTION OF THE WOOD FRAMED BARN STRUCTURE, AS WELL AS IT'S FOUNDATIONS SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR. STRUCTURAL DESIGN CRITERIA FOR THE WOOD FRAMED BARN STRUCTURE SHALL BE AS OUTLINED UNDER THE "LIVE LOADS" SECTION OF THESE GENERAL NOTES.

SHOP DRAWINGS/SUBMITTALS ORIGINAL SHOP DRAWINGS/SUBMITTALS SHALL BE SUBMITTED FOR ARCHITECT/ENGINEER'S REVIEW FOR THE FOLLOWING:

CONCRETE MIX DESIGN CONCRETE AND MASONRY REINFORCING STEEL SHOP DRAWINGS

STRUCTURAL STEEL, STEEL JOIST, AND METAL DECK SHOP DRAWINGS PRE-ENGINEERED METAL BUILDING (PEMB) SHOP DRAWINGS AND CALCULATIONS (SIGNED & SEALED BY A PROFESSIONAL ENGINEER

REGISTERED IN THE STATE OF MARYLAND) STEEL STAIR AND RAILING SYSTEMS SHOP DRAWINGS AND CALCULATIONS (SIGNED & SEALED BY A PROFESSIONAL ENGINEER REGISTERED IN THE STATE OF MARYLAND) COLD-FORMED METAL FRAMING SHOP DRAWINGS AND CALCULATIONS (SIGNED & SEALED BY A PROFESSIONAL ENGINEER REGISTERED IN THE

STATE OF MARYLAND) BARN STRUCTURE AND IT'S FOUNDATION SHOP DRAWINGS AND CALCULATIONS (SIGNED & SEALED BY A PROFESSIONAL ENGINEER REGISTERED IN THE STATE OF MARYLAND) IF A CONTRACTOR OR OWNER FAILS TO SUBMIT THE SHOP DRAWINGS, THE FIRM, MINCIN PATEL MILANO, INC. WILL NOT BE RESPONSIBLE FOR THE CONTRACTORS INTERPRETATION OF THE INTENT OF THE STRUCTURAL DRAWINGS. AT THE TIME OF THE SHOP DRAWING SUBMISSION, THE GENERAL CONTRACTOR SHALL STATE IN WRITING ANY DEVIATION OR OMISSIONS FROM THE CONTRACT DOCUMENTS. THE GENERAL CONTRACTOR SHALL

REVIEW ALL SHOP DRAWINGS PRIOR TO SUBMISSION TO THE A/E AND SHALL MAKE ALL CORRECTIONS AS HE DEEMS NECESSARY. AN INDEPENDENT INSPECTION AGENCY, PAID FOR BY THE CONTRACTOR AND APPROVED BY THE ARCHITECT/ ENGINEER, SHALL INSPECT/ MONITOR/ TEST THE FOLLOWING ITEMS:

EARTHWORK OPERATIONS INCLUDING PLACEMENT OF COMPACTED FILL AND VERIFICATION OF SOIL BEARING CAPACITY CAST IN PLACE CONCRETE AND REINFORCING STEEL MASONRY AND REINFORCING STEEL

STRUCTURAL STEEL, STEEL JOISTS, METAL DECK, AND STEEL STAIRS AND RAILING PRE-ENGINEERED METAL BUILDING (PEMB) COLD-FORMED METAL FRAMING

BARN STRUCTURE COPIES OF THE INSPECTORS FINAL REPORTS CERTIFYING THAT THE ITEMS INSPECTED HAVE BEEN INSTALLED IN ACCORDANCE WITH THE REQUIREMENTS OF THE CONTRACT DOCUMENTS SHALL BE SUBMITTED TO THE ARCHITECT/ENGINEER.

LIVE LOADS

THIS BUILDING HAS BEEN DESIGNED FOR THE FOLLOWING LIVE LOAD CRITERIA FROM THE 2015 INTERNATIONAL BUILDING CODE AND ASCE 7-10: RISK CATEGORY:

> $S_{DS} = 0.133$ $S_{DI} = 0.080$

R = 2

V = BY PEMB SUPPLIER

R = BY BARN SPECIALTY ENGINEER Cs = BY BARN SPECIALTY ENGINEER

EQUIVALENT LATERAL FORCE PROCEDURE

ROOF LIVE LOAD: COLLATERAL LOAD AT PEMB & BARN: FIRST FLOOR LIVE LOAD: 100psf **BARN LOFT:** 50psf SNOW LOAD: GROUND SNOW (Pa) FLAT ROOF SNOW LOAD (Pt) 21psf SNOW EXPOSURE FACTOR (Ce) SNOW IMPORTANCE FACTOR (Is) SNOW THERMAL FACTOR (Ct) SNOW DENSITY BASIC WIND SPEED: 115mph WIND EXPOSURE: INTERNAL PRESSURE COEFFICIENT: ±0.18

HEIGHT & EXPOSURE ADJUSTMENT COEFFICIENT: SEE TABLES, THIS SHEET WIND DESIGN PRESSURES:

RISK CATEGORY SEISMIC IMPORTANCE FACTOR Ie SEISMIC SITE CLASS MAPPED SPECTRAL RESPONSE COEFFICIENTS: $S_S = 0.125$ $S_1 = 0.050$ SITE COEFFICIENTS $F_a = 1.6$ $F_V = 2.4$ DESIGN SPECTRAL RESPONSE COEFFICIENTS

SEISMIC DESIGN CATEGORY: **ANALYSIS PROCEDURE:** CONVENTIONALLY FRAMED BUILDING: BASIC SEISMIC FORCE RESISTING SYSTEM: ORDINARY REINFORCED MASONRY SHEAR WALLS & CONCRETE SHEAR WALLS. RESPONSE MODIFICATION COEFFICIENT:

SEISMIC RESPONSE COEFFICIENT: $C_S = 0.066$ DESIGN BASE SHEAR: $V = 130^{K}$ PRE-ENGINEERED METAL BUILDING (PEMB): BASIC SEISMIC FORCE RESISTING SYSTEM: PRE-ENGINEERED STEEL SYSTEM NOT SPECIFICALLY DESIGNED FOR SEISMIC DESIGN. RESPONSE MODIFICATION COEFFICIENT: R = 3C_S = BY PEMB SUPPLIER

SEISMIC RESPONSE COEFFICIENT: DESIGN BASE SHEAR: BARN (WOOD): BASIC SEISMIC FORCE RESISTING SYSTEM: BY BARN SPECIALTY ENGINEER RESPONSE MODIFICATION COEFFICIENT:

SEISMIC RESPONSE COEFFICIENT:

DESIGN BASE SHEAR: MAINI WINDEADAE DECICTINA OVATENA

	MAIN WINDFORCE RESISTING SYSTEM									
	HORIZ			(DE	VERT	FICAL SSURES IN	OVERHANG (DESIGN PRESSURES IN psf)			
Α	В	О	D	Е	F	G	Н	E _{oH}	G _{OH}	
25.8	-13.4	17	-8	-31	-17.6	-21.5	-13.6	-43.4	-34	
UNF	UNFACTORED DESIGN WIND PRESSURE IN PSF FROM ASCE 7-10									

MULTIPLY BY 0.6 FOR ALLOWABLE STRESS DESIGN

	(DES	ROOF SIGN PRESSURES II	WALLS (DESIGN PRESSURES IN psf)		
ZONE SF	1	2	3	4	5
10sf	12 -29.3	12 -49	12 -73.9	29.3 -31.7	29.3
20sf	11.2 -28.5	11.2 -43.9	11.2 -61.3	27.9 -30.4	27.9 -36
50sf	10.2 -27.6	10.2 -37	10.2 -44.4	26.2 -28.7	26.2
100sf	9.5 -26.8	9.5 -31.7	9.5 -31.7	24.8 -27.3	24.8 -30
500sf				21.8 -24.4	21.8 -24

MULTIPLY BY 0.6 FOR ALLOWABLE STRESS DESIGN

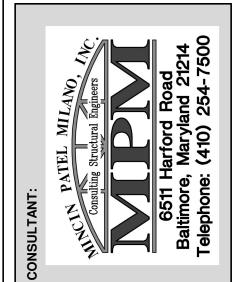
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10839-D PHILADELPHIA RD

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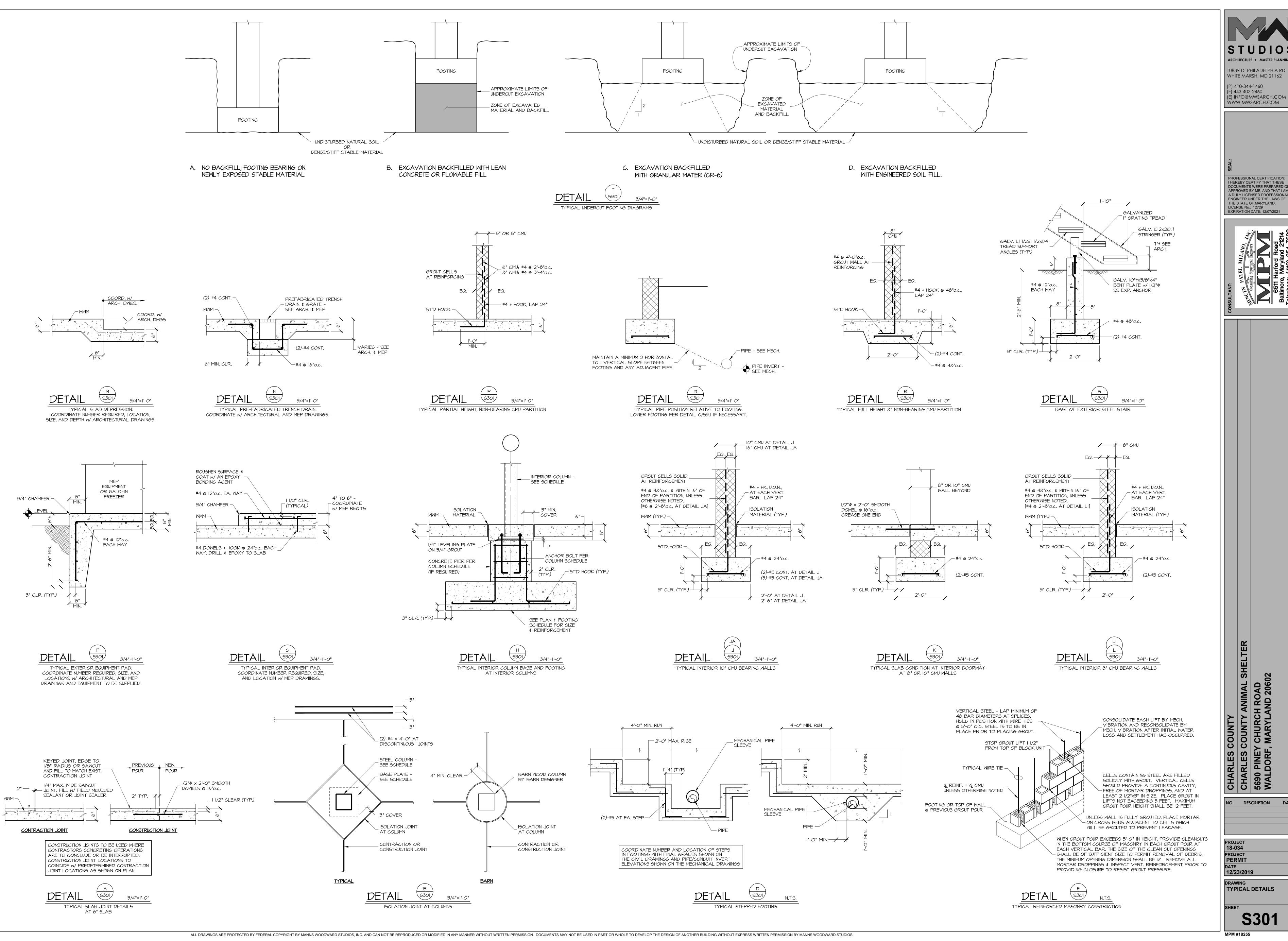


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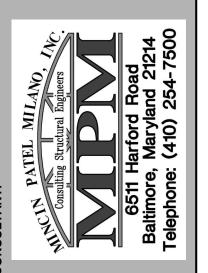
12/23/2019 **GENERAL NOTES &**

SCHEDULES S20⁻



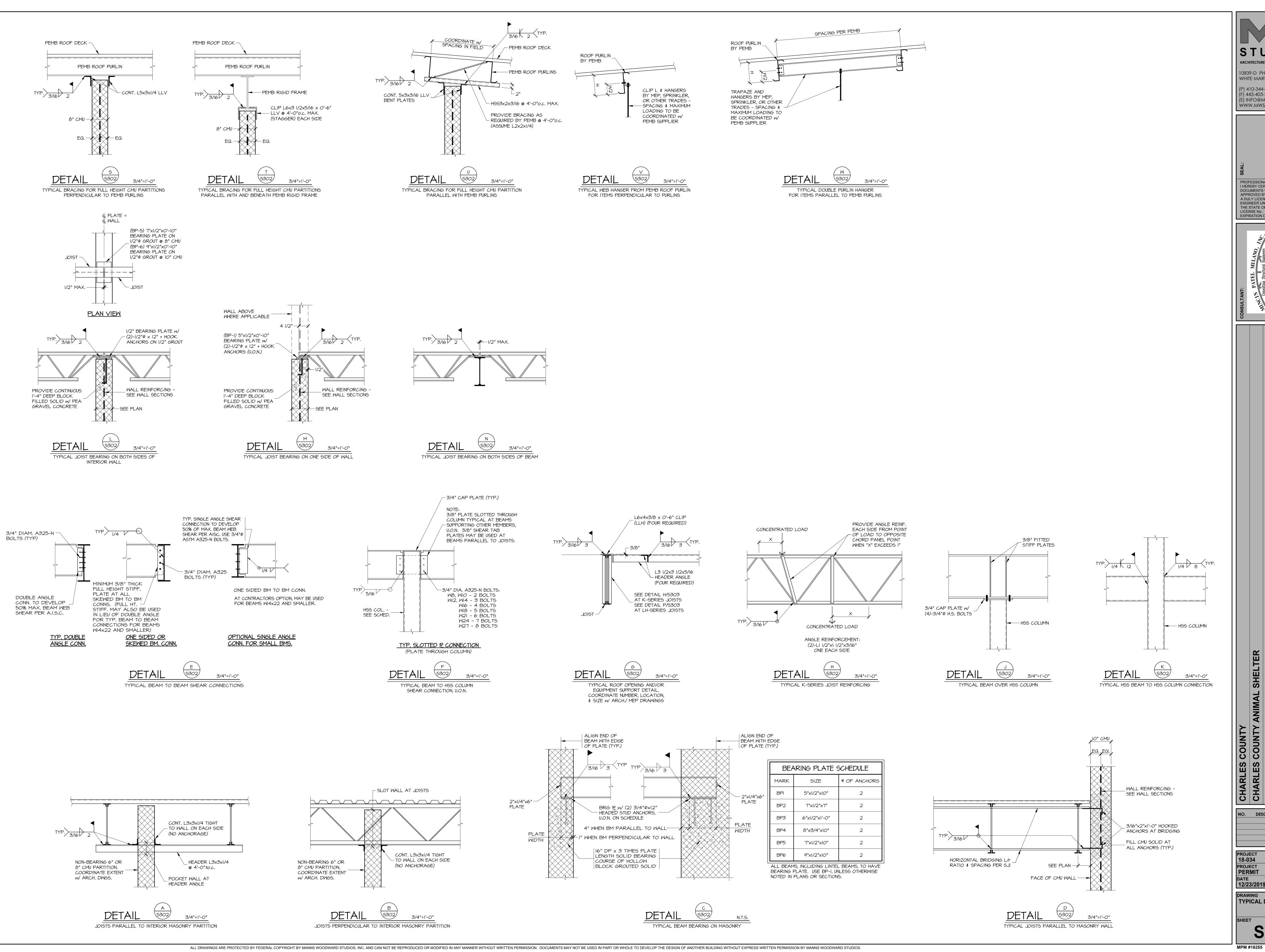
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NO. DESCRIPTION

TYPICAL DETAILS



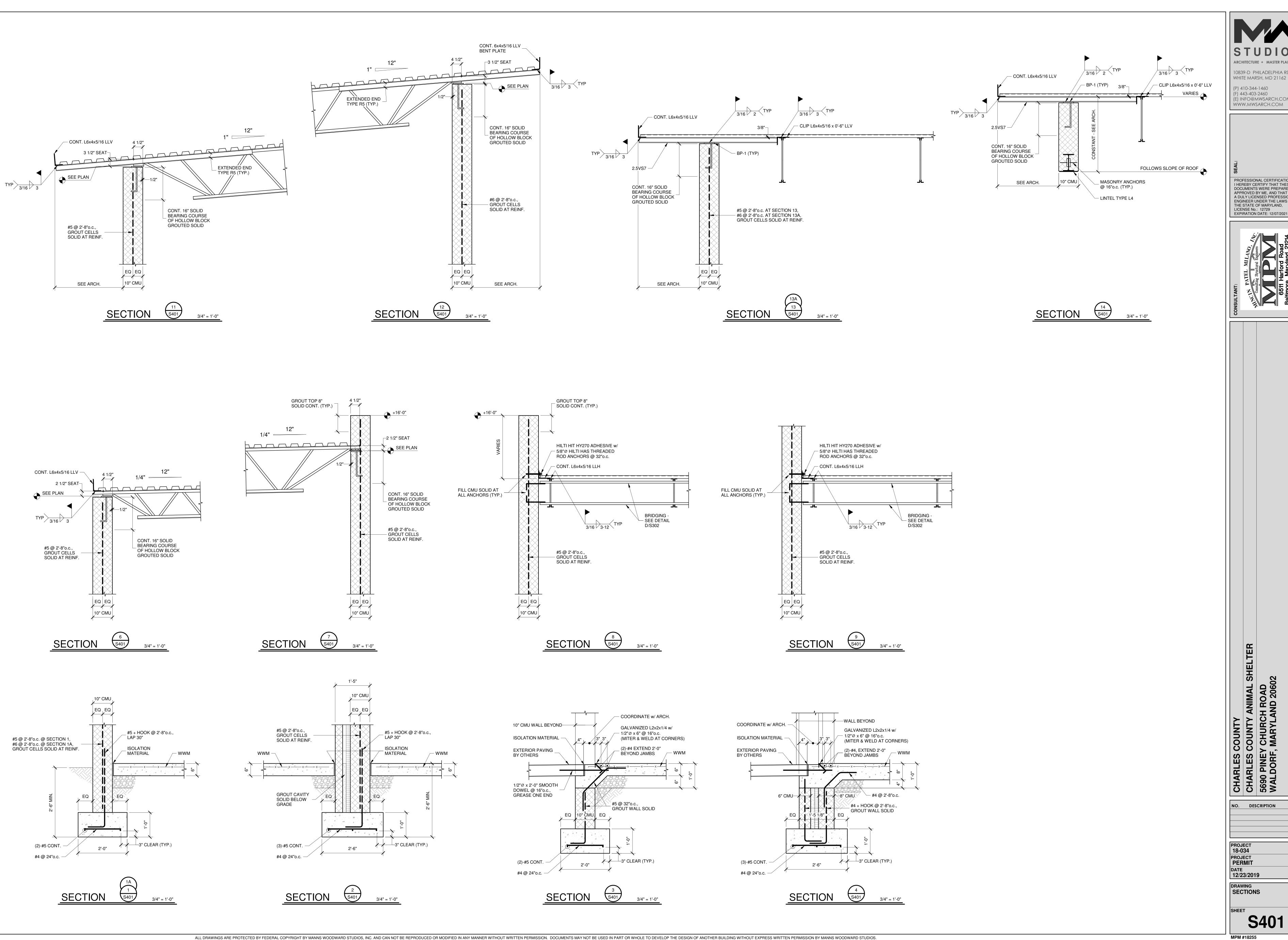
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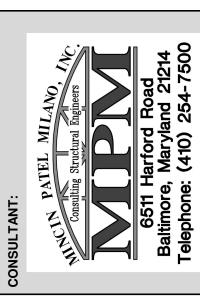
18-034
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TYPICAL DETAILS

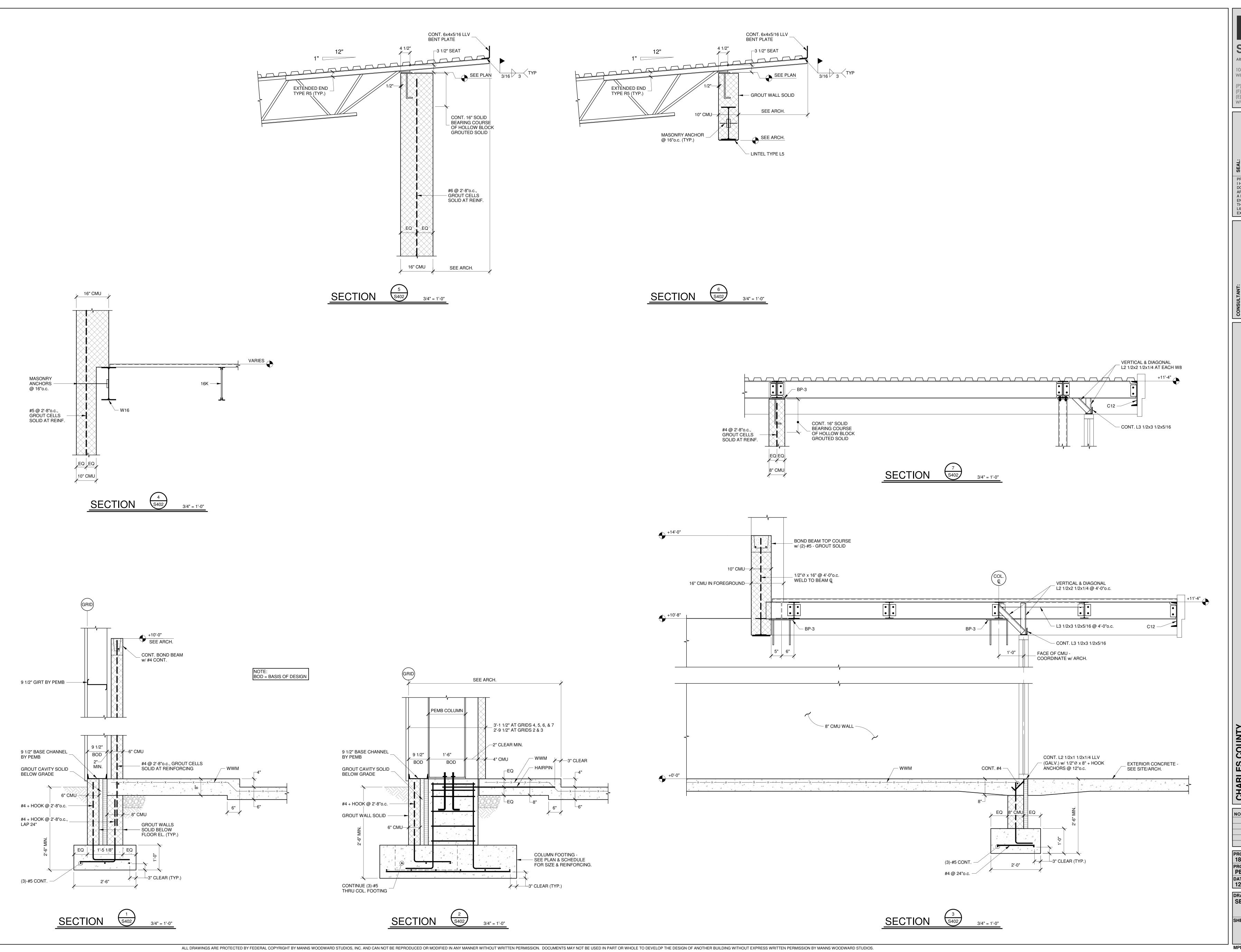


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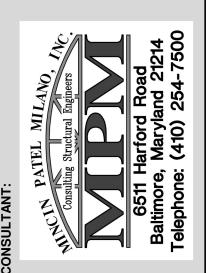


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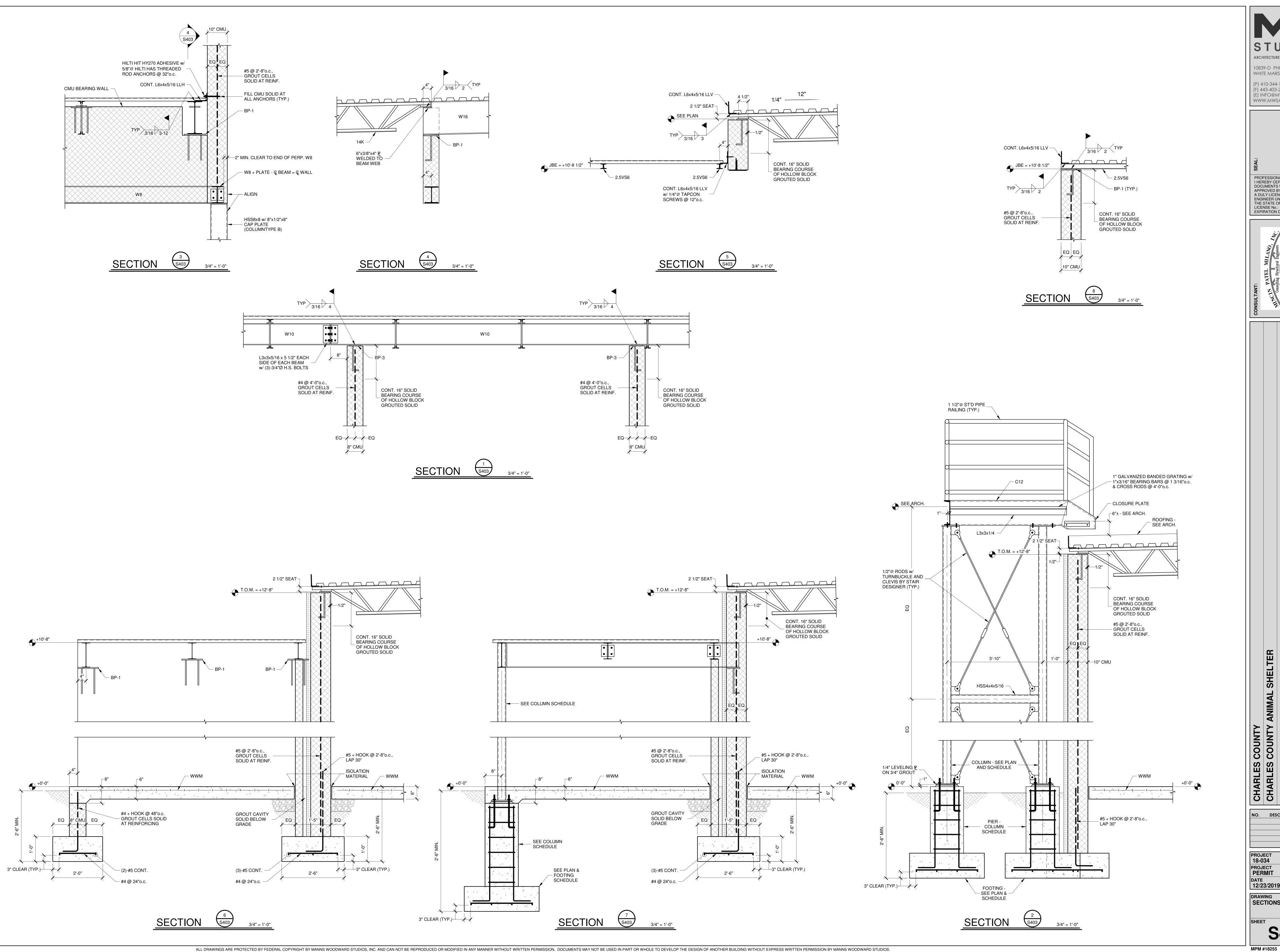
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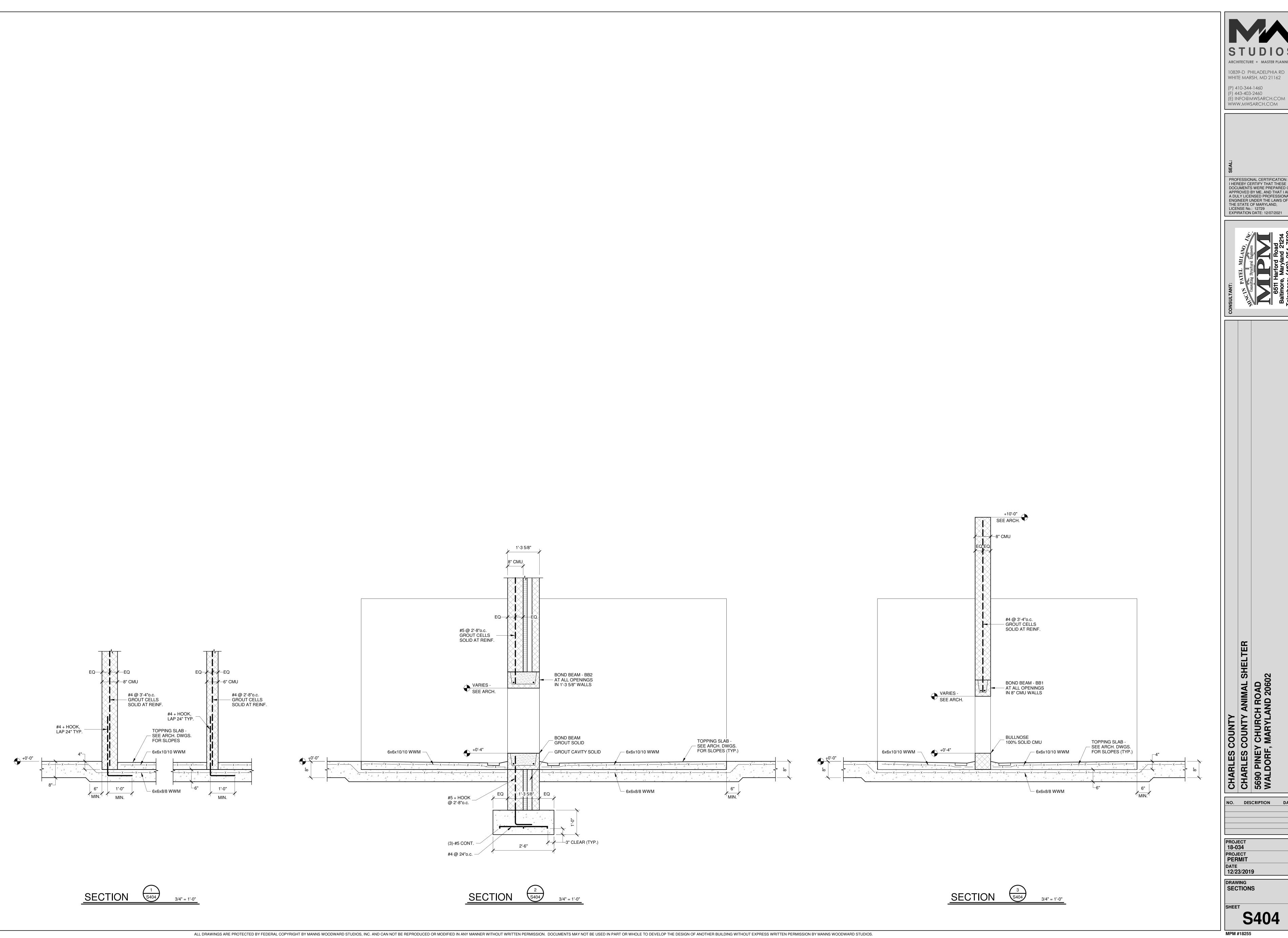


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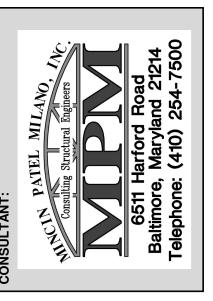
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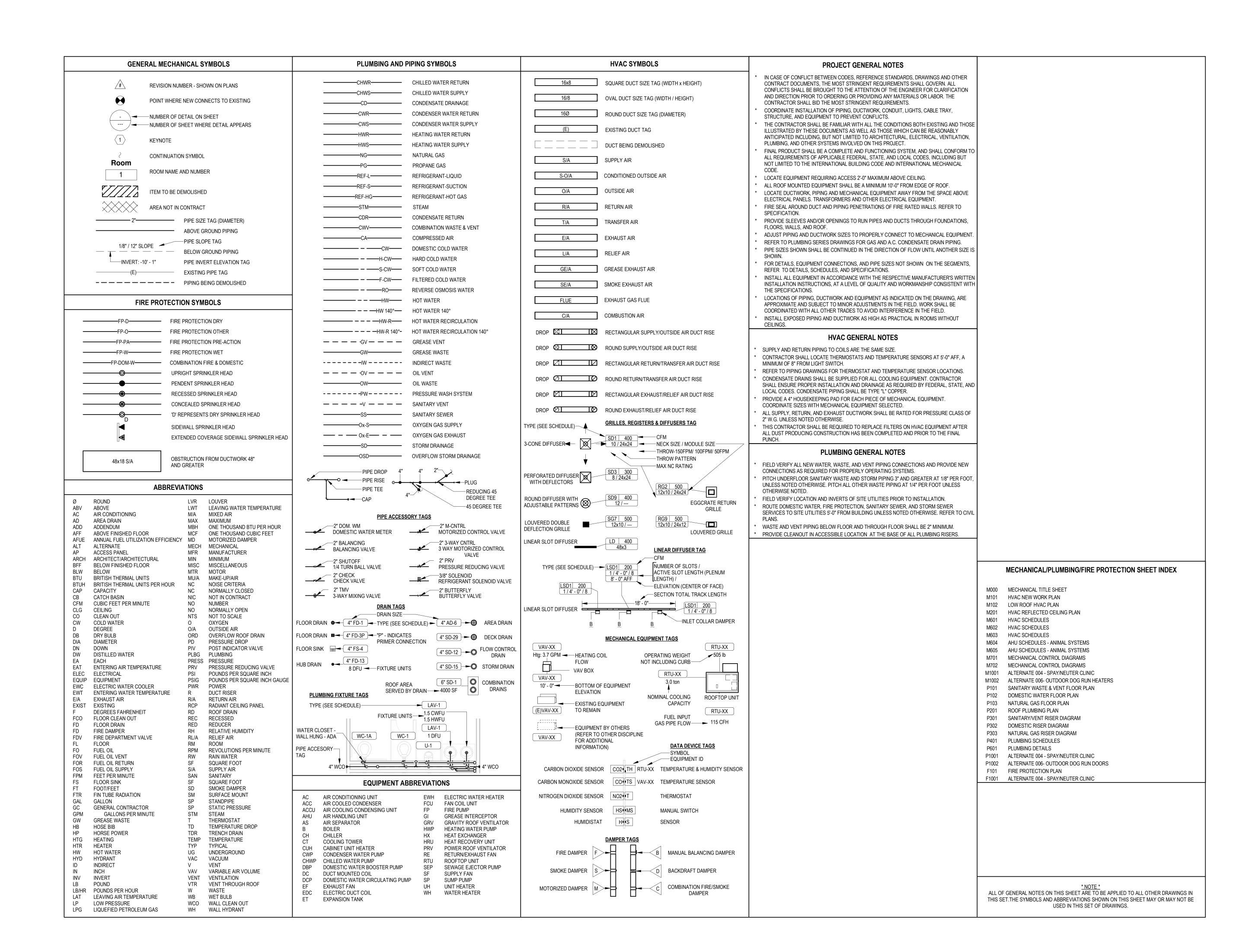
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LICENSE NUMBER: #47259
EXPIRATION DATE: 9-23-2021



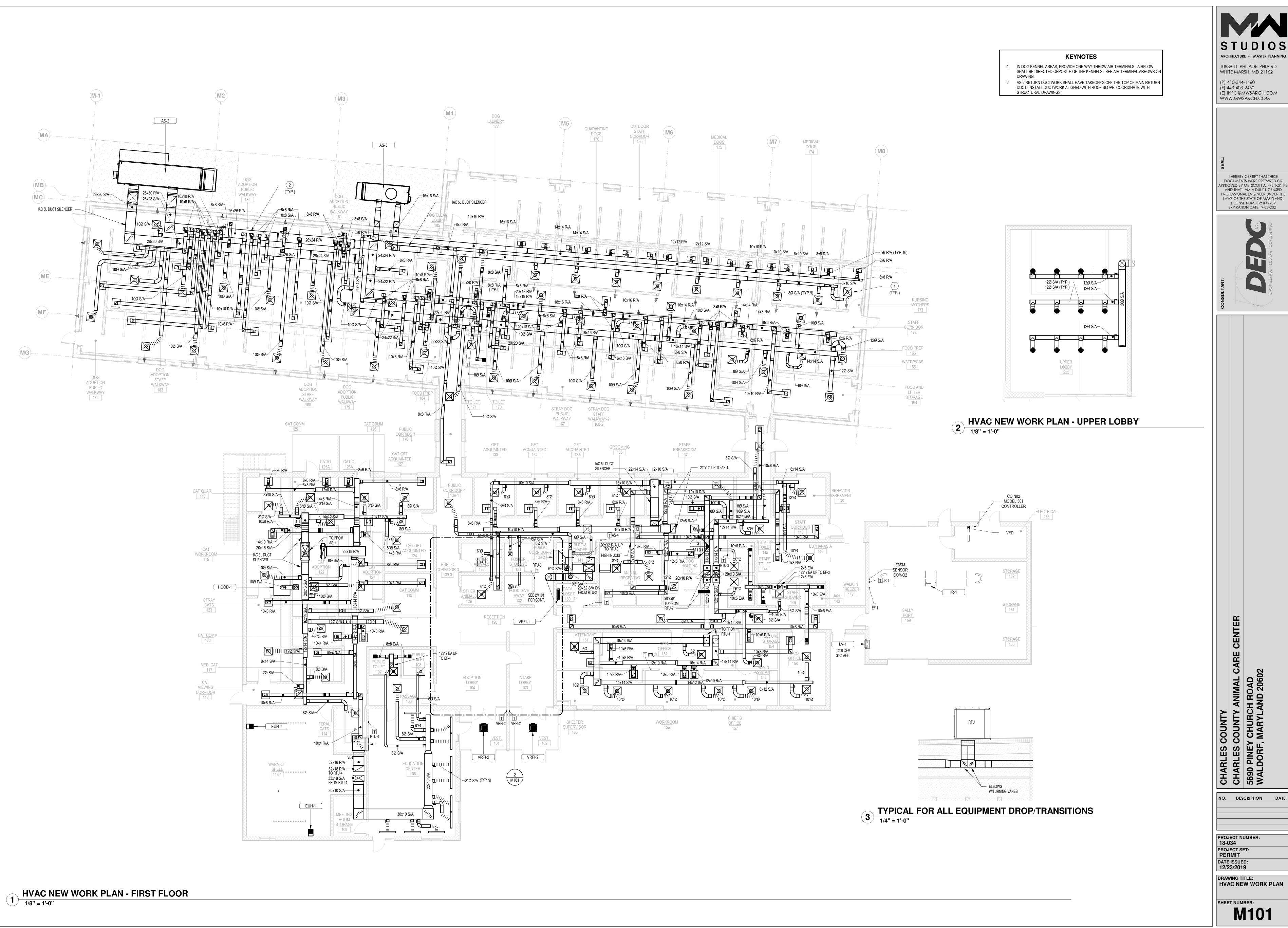
ES COUNTY ANIMAL CARE CENTER
NEY CHURCH ROAD

NO. DESCRIPTION DATE

PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE:
MECHANICAL TITLE
SHEET

SHEET NUMBER:



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PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE: HVAC NEW WORK PLAN SHEET NUMBER: M101



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LICENSE NUMBER: #47259
EXPIRATION DATE: 9-23-2021



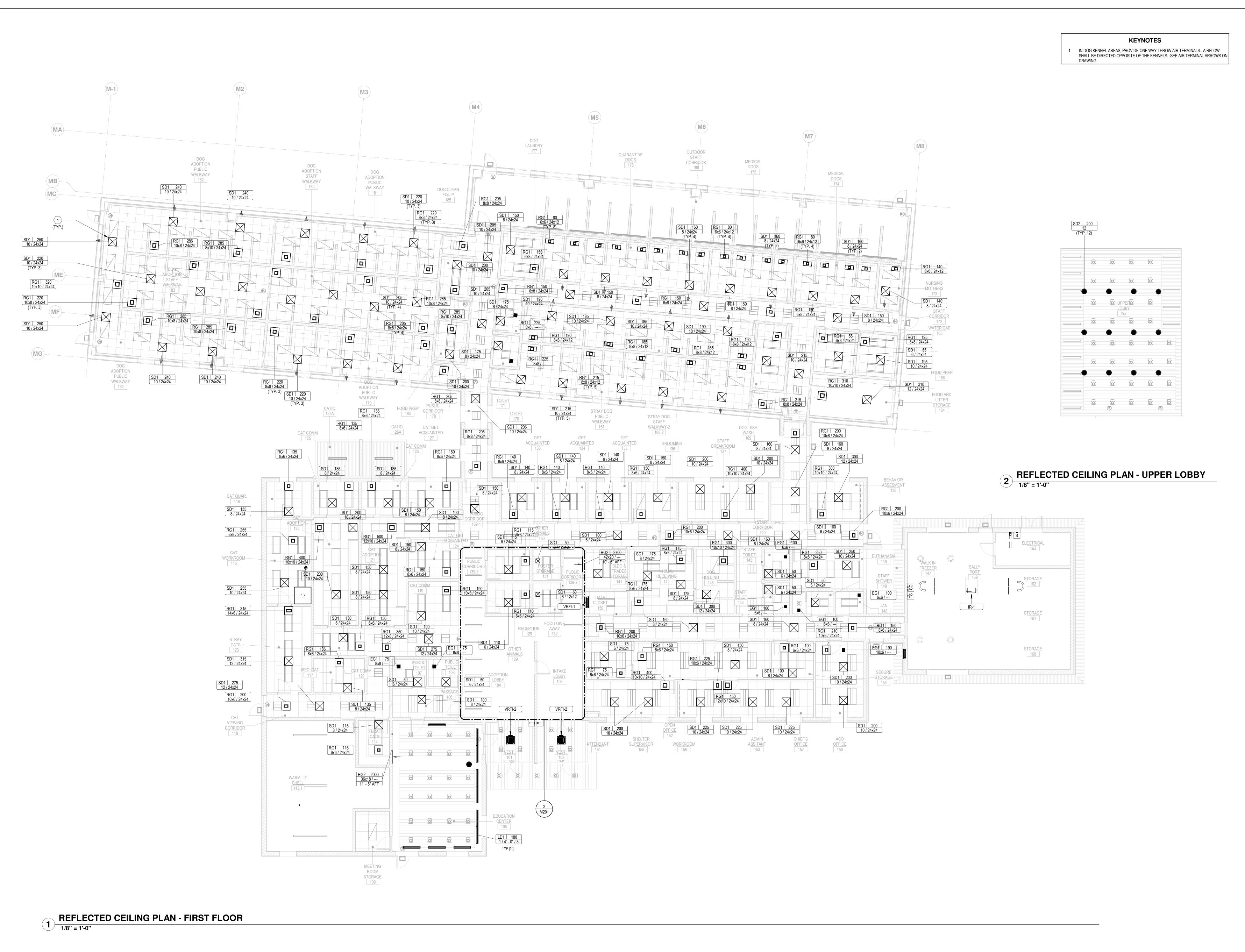
CHARLES COUNTY
CHARLES COUNTY ANIMAL CARE CENTER
5690 PINEY CHURCH ROAD
WALDORF, MARYLAND 20602

PROJECT NUMBER:
18-034
PROJECT SET:
PERMIT
DATE ISSUED:
12/23/2019

DRAWING TITLE:
LOW ROOF HVAC PLAN

SHEET NUMBER:

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PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED:

12/23/2019 DRAWING TITLE: HVAC REFLECTED CEILING PLAN

SHEET NUMBER:

VRFI-1

Job Name:		
Schedule Reference:		Date:
	SPECIFICATIONS Capacity*	
	1	24,000 Btu/h
	Heating	27,000 Btu/h
	Power	
	Power Consumption	208 / 230V, 1-phase, 60Hz
AMINIARISH ELECTRIC	Cooling	0.07 kW
22	Current	
		0.50 A
	Minimum Circuit Ampacity (MC	A)0.63 A
GENERAL FEATURES	Maximum Overcurrent Protection	n (MOCP) Fuse15 <i>P</i>
	ExternalFinish	MunsellNo.1.0Y9.2/0.2
 Dual set point functionality Compact, lightweight, shiny-white, flat-panel design 	External Dimensions	
Quiet operation		-3/8 H x 46-1/16 W x 11-5/8 D 365 H x 1.170 W x 295 D
 Multiple fan-speed settings Intake grille filter is easily removed for cleaning 		,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,
Wireless receiver on board	Net Weight Unit	46 lbs. / 21 kg
	Coil Type	Cross Fir
		m Plate Fin and Copper Tube
OPTIONS	 Fan	
■ Condensate PumpSl3100-230 □ CN24 Relay KitCN24RELAY-KIT-CM3		Line Flow Fan x 1 570 - 920 CFM
= 0.12 1 1013, 141		Direct-drive DC Motor
	Air Filter	Polypropylene Honeycomb
	Refrigerant Piping Dimension	ıs
	Liquid (High Pressure)	3/8" / 9.52 mm (Flare) 5/8" / 15.88 mm (Flare)
	Drainpipe Dimension	I.D. 5/8" / 16 mm
	Sound Pressure Levels	
	Low-High	39 - 49 dB(A)
* Cooling / Heating capacity indicated at the maximum value at operation under the Cooling Indoor: 80° F (27° C) DB / 67° F (19° C) WB, Outdoor 95° F (35° C) D		
Heating Indoor: 70° F (21° C) DB, Outdoor 47° F (8° C) DB / 43° F (6° C) WB	ь	
Notes:		
		and the same of th

VRFO-1

CITY MULTI ® MODEL: PUMY-P48NKMU2(-BS)	MITSUBISHI ELECTRIC		SPECIFICATIONS	: PUM
lob Name:		Nominal Cooling Capacity (208/230V) ¹		
System Reference:	Date:	Nominal Heating Capacity (208/230V) ²		
UTDOOR VRF SYSTEM		Operating Temperature Range	Cooling (Outdoor)	
SIBOSK VIL GISTEIN		5 4 4 Di (4 M/ D)	Heating (Outdoor)	
And Hymne		External Dimensions (H x W x D)	In. / mm	
		Net Weight	Lbs. / kg	0-1
		External Finish	Veller Bleer Heat	Galva
		Electrical Power Requirements	Voltage, Phase, Hertz	
		Minimum Circuit Ampacity (MCA)	A	
		Maximum Overcurrent Protection (MOF	·	
		Recommended Fuse Size	Α	
		Short-circuit Current Rating (SCCR)	kA	
		Piping Diameter (Flare) In. / mm	Liquid (High Pressure)	
			Gas (Low Pressure)	
		Indoor Unit	Total Capacity	
			Model / Quantity	
NIT OPTION		Fan Type x Quantity		
Standard Model (PUMY-P48NKMU2)		Fan Motor Output	kW	
Seacoast <bs> Model (PUMY-P48NKMU2-BS)</bs>		Airflow Rate	CFM	
eacoasi NDS INIOCE (FOINTE 4011/01/02-05)		Compressor Operating Range	Cooling	
		Compressor Operating Natige	Heating	
ITURES		Compressor Type x Quantity		
Connects up to 12 indoor units Single-phase outdoor unit with Variable Refrigerant Flow Zoning (VRF) technology		Compressor Motor Output	kW	
Service accessible through both a front and side panel		Sound Pressure Level	Cooling dB(A)	
Up to 984 ft. of total pipe length ENERGY STAR® certified units ¹		Sound Plessure Level	Heating dB(A)	
mproved efficiency		Refrigerant		
		Lubricant		
CCESSORIES			High Pressure	
Joint Kit (for details see Pipe Accessories Submittal)		Protection Devices	Inverter Circuit	
Header Kit (for details see Pipe Accessories Submittal)			Compressor	
Air Outlet Guide (One Piece) ² (PAC-SH96SG-E)			EER	
		AHRI Ratings	SEER	
Front Wind Baffle (One Piece) ² (WB-PA3)		(Ducted / Non-Ducted)	COP	
Drain Pan (PAC-SH97DP-E)			HSPF	
Orain Socket (PAC-SG61DS-E)				-
Base Pan Heater (PAC-SJ20BH-E)		Notes		
		¹ Cooling Indoor: 81 ° F (27 ° C) DB / 66	3 ° F (19 ° C) WB; Outdoor: 95 ′	° F (35 ° C
Air Deflector Vertical (ADV-1) 18" QUICK SLING EQUIPMENT STAND		² Heating Indoor: 68° F (20° C) DB, Out	door 45° F (7° C) DB / 43° F (6°	s° C) W/R
TO WOTON SETTING EQUITIVIENT STAIND		³ When using Wind Baffles [WB-PA3], th		

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Nominal Cooling Capacity (208/230V) ¹	Btu/h		48,000			
Nominal Heating Capacity (208/230V) ²	Btu/h		54,000			
Operating Temperature Range	Cooling (O	utdoor)	5° to 115° F (-15 to +46° C) DB ^{3, 4}			
Operating remperature Kange	Heating (O	utdoor)	-13° to +59° F (-25° to +15.0° C) WB			
External Dimensions (H x W x D)	In. / mm		52-11/16 x 41-11/32 x 13+1 / 1,338 x 1050 x 330+25			
Net Weight	Lbs. / kg		267 / 121			
External Finish			Galvanized sheets (+power coating for -BS type) <munsell 1.1="" 3y="" 7.8=""></munsell>			
Electrical Power Requirements	Voltage, Pl	nase, Hertz	208/230V, 1-Phase, 60Hz			
Minimum Circuit Ampacity (MCA)	А		29			
Maximum Overcurrent Protection (MOP)	А		44			
Recommended Fuse Size	A		30			
Short-circuit Current Rating (SCCR)	kA		5			
D D	Liquid (Hig	h Pressure)	3/8 (9.52) Flare			
Piping Diameter (Flare) In. / mm	Gas (Low I	Pressure)	5/8 (15.88) Flare			
	Total Capa	city	50-130% of outdoor unit capacity			
ndoor Unit Model / Quantity		antity	P05-P54 / 1-12			
Fan Type x Quantity			Propeller fan x 2			
Fan Motor Output	kW		0.074 + 0.074 (two fan motors)			
Airflow Rate	CFM		3,885			
	Cooling		23% to 100%			
Compressor Operating Range	Heating		18% to 100%			
Compressor Type x Quantity			INVERTER-driven Scroll Hermetic x 1			
Compressor Motor Output	kW		3.3			
0	Cooling	dB(A)	51			
Sound Pressure Level	Heating	dB(A)	54			
Refrigerant			R410A; (10 lbs + 9 oz) (4.8kg)			
Lubricant			FV50S (2.3 liters)			
	High Press	ure	High pressure sensor, High pressure switch 601 psi (4.15 MPa)			
Protection Devices	Inverter Cir	cuit	Over-heat protection, Over-current protection			
	Compresso	or	Discharge thermo protection, Over-current protection			
	EER		11.3 / 13.1			
AHRI Ratings	SEER		16.5 / 22.6			
(Ducted / Non-Ducted)	COP		3.3 / 4.0			
	HSPF		11.0 / 12.0			

sing Wind Baffles [WB-PA3], the minimum operating range is 5° F. Without Wind Baffles, the minimum operating range is 23° F.

onnecting PKFY-P06NBMU/P08NHMU,PFFY-P06/08/12NEMU or PFFY-P06/08/12NRMU indoor units, the minimum operating range is 50° F.

□ SLP-18FAU

□ SLP-18FAEU □ PAC-SF1ME-E □ PAR-SF9FA-E □ PAR-FL32MA-E □ PAR-SL100A-E □ PAR-FA32MA-E X PAR-33MAA-J □ PAC-YT53CRAU

□ PAR-U01MEDU-K □ PAC-SE41TS-E

□ PAC-US444CN-1

□ PAC-WHS01WF-E

□ PAC-SA88HA-EP

□ PAC-SE55RA-E

□ PAC-SF40RM-E¹

□ DPLS2

□ CN24RELAY-KIT-CM3

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SPE	CIFICATIONS: PLFY	-PT3NFWU-E
Model Nominal Capacity ¹		PLFY-P15NFMU-E
Cooling	Btu/h	15,000
Heating	Btu/h	17,000
Electrical	Ban	11,000
Electrical Power Requirements		1-phase 208-230V 60Hz
Minimum Circuit Ampacity (MCA)	A	0.35
Recommended Fuse Size	A	15
External Dimensions (H x W x D)		``
Unit	in. (mm)	8-3/16 x 22-7/16 x 22/7-16 (208 x 570 x 570)
Grill (SLP-18FAU)	in. (mm)	13/32 x 24-19/32 x 24-19/32 (10 x 625 x 625)
Net Weight	, ,	
Unit	lbs (kg)	31.3 (14.2)
Grill (SLP-18FAU)	lbs (kg)	5.3 (2.4)
External Finish		
Unit		Galvanized steel sheet
Grill (SLP-18FAU)		Munsell 1.0Y 9.2/0.2
Coil Type		Cross fin (Aluminum fin and copper tube)
Fan		
Type x Quantity		Turbo fan x 1
Airflow rate	CFM	265-315-390
Motor Type		DC motor
Motor Output	kW	0.05
Motor F.L.A.	A	0.28
Air Filter		PP honeycomb fabric (long life type)
Refrigerant Piping Diameter	'	
Liquid (High Pressure)	in. (mm)	1/4 (6.35) Flare
Gas (Low Pressure)	in. (mm)	1/2 (12.7) Flare
Field Drain Pipe Size	in. (mm)	O.D. 1-1/4 (32)
Sound Pressure Level (Low-Mid-High)	dB(A)	28-33-39

Specifications are subject to change without notice.

	ACCESSORIES: PLFY-P15NFM
Grille (required)	
Grille with 3D i-see Sensor™	
Corner Panel with 3D i-see Sensor™	
Signal Receiver Corner Panel	
Wireless Remote Controller	
Wireless Remote Controller	
Wireless Remote Receiver	
Wired MA Controller	
Simple MA Controller	
Smart ME Remote Controller	
Wired Remote Sensor	
Thermostat Interface	
Wireless Interface	
Connector cable for remote display	
Connector for CN32 (remote on/off)	
Remote Operation Adapter (with wire terminals	for remote ON/OFF and operation status/ error)
External Fan / Heater Control Relay Adapter	
	shut off to prevent drain pan overflow)
Drain Pan Level Sensor (Control for indoor unit	

¹Requires a PAR-33MAA-J controller

Four fan speed settings including auto-fan

2' x 2' size matches size of many ceiling tiles

Ventilation air intake supported

Corner-pocket design for simplified installation

Built-in condensate lift mechanism designed to provide up to 33" of lift

Individual vane settings

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Heating | Indoor: 68° F (20° C) DB; Outdoor 45° F (7° C) DB / 43° F (6° C) WB

Specifications are subject to change without notice.

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	GAS FIRED RADIANT HEATER SCHEDULE												
						GAS			ELECT	RICAL			
									Numbe		Full		
Identity						Minimum Inlet	Maximum Inlet		r of		Load		
Mark	Count	Description	Manufacturer	Model	Heating Input	Pressure	Pressure	Voltage	Poles	Frequency	Amps	Type Comments	
IR-1	1	Twin Fire Unitary Infrared Heater	Roberts	TF-120N-40H-U	120000 Btu/h	5.00 in-wg	16.00 in-wg	120 V	1	60 Hz	1.0 A	40' HRS TUBE AND HEIGH EFFICIENCY REFLECTOR INSTALLED IN	
			Gordon®									U-TUBE CONFIGURATION. USE ZERO BOUNCE BACK HIGH	
												EFFICIENCY REFLECTORS RATED AT EF-15 BY AHRI 1330 STANDARD.	
												USE 24 TOTAL REFLECTOR SUPPORTS PER HEATER. PROVIDE NEMA 4X	
												MOISTURE RESISTANT LINE VOLTAGE THERMOSTAT.	

- 1. INCLUDE COMPLETE SYSTEM, BURNER/PUMPS/CONTROL PANEL MOUNTING HARDWARE 2. TUBING SHALL BE HEAT TREATED ALUMINIZED OR HOT ROLLED STEEL AS INDICATED ON PLAN DRAWINGS.
- 3. ALL BURNERS SHALL HAVE COMBUSTION INTAKE FILTERS. 4. PROVIDE 120V, 20 AMP SYSTEM CONTROL PANEL, MANUFACTURER MODEL #0277002 AND RECOMMENDED 24-VOLT THERMOSTATS.

	ELECTRIC UNIT HEATER SCHEDULE												
Lateratik a Adamsta	Maria farataman	N 4 = -1 = 1	0	Total Heating		DI	F	Torre Commont.					
Identity Mark	Manufacturer	Model	Count	Capacity	Voltage	Phase	Frequency	Type Comments					
EUH-1	Marley Engineered Products	MWUH5004	2	8553 Btu/h	208 V	1	60 Hz	Electric Unit Heater w/Wall Mounting Bracket and integral t-stat					

				EXHA	4021	ΓA	11 2C	HEL	JULE	- -			
					Config		Electric	al Data					
Type Mark	MFG	MODEL	AIRFLOW	Specific Product Description	Total Static Pressure	Volta ge	Frequency	Design Total Power	Phase Number	Motor Speed	Inlet Sones	Unit Weight	Type Comments
EF-1	Greenheck	CUE-101-VG	1200 CFM	Direct Drive Upblast Centrifugal Roof Exhaust Fan	0.33 in-wg	115 V	60 Hz	0.21 hp	1	1725			CONNECTED TO CO/NO MONITORING SYSTEM WITH VFD FOI SUMMER COOLING
EF-2	CaptiveAire	NCA8FA	600 CFM	Upblast Centrifugal Roof Exhaust Fan - Dishwasher Hood	0.38 in-wg	208 V	60 Hz	0.12 hp	1	1109	4.2	93 lb	INTERLOCK WITH DISHWASHER CONTROLLER. PROVIDE WITH CURB, 115 BACKDRAFT DAMPER
EF-3	Greenheck	CUE-101HP-VG	665 CFM	Direct Drive Upblast Centrifugal Roof Exhaust Fan	0.25 in-wg	115 V	60 Hz	0.05 hp	1	1725		60 lb	
EF-4	Greenheck	CUE-101HP-VG	200 CFM	Direct Drive Upblast Centrifugal Roof Exhaust Fan	0.25 in-wg	115 V	60 Hz	0.02 hp	1	1725		60 lb	

EF-1, 3, 4 NOTES:	EF-5 NOTES:
Motor - Vari-Green EC motor	Motor - Vari-Green EC motor
Control - Dial for balancing	Control - 0-10VDC Input (Future BAS integration)
UL/cUL 705 Listed - "Power Ventilators"	Control - Dial for balancing
Switch, NEMA-3R, Toggle, Mtd/wired	UL/cUL 705 Listed - "Power Ventilators"
Junction Box Mounted & Wired	Switch, NEMA-3R, Toggle, Mtd/wired
Hinged Base (Attached)	Junction Box Mounted & Wired
Foam Curb Seal (Attached)	Hinged Base (Attached)
Damper Shipped Loose, BD-100-PB-12X12, Gravity Operated, Not Coated	Foam Curb Seal (Attached)
Hood Hasps	Damper Shipped Loose, BD-100-PB-10X10, Gravity Operated, Not Coated
Stainless Steel Fasteners - 300 Series	Hood Hasps
Birdscreen: Galvanized	Stainless Steel Fasteners - 300 Series
W/ROOF CURB	Birdscreen: Galvanized

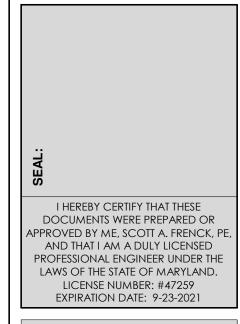
W/ROOF CURB

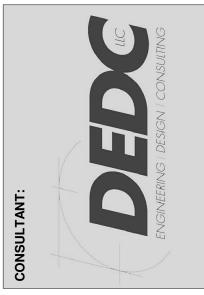
							HOOD	SCHEDU	JLE						
TAG	MODEL	MAX. COOKING TEMP.	TOTAL EXH. CFM	WIDTH	LENGTH	HEIGHT	MOUNTING HEIGHT ABOVE FLOOR	HOOD FIELD WRAPPER HEIGHT	EXHAUST DUCT DIA	СҒМ	VEL	S.P.	HOOD CONSTRUCTION	FIRE SYSTEM PIPING	HOOD HANGING WEIGHT
HOOD-1	4824 VHB-G	700 DEG F	600 4	18"	48"	24"	80"	4"	10"	600	1100	-0.09	304 SS	NONE	186 LBS

	LOUVER SCHEDULE											
Туре								Air	Free	Free Area		
Mark	Mark	Manufacturer	Model	Description	Height	Width	Depth	Flow	Area	Velocity	Type Comments	
LV	LV-1	Greenheck		Drainable Stationary Louver. Extruded Aluminum	3' - 0''	2' - 0''	0' - 6''	1200 CFM	14.68 SF	82 FPM	w/Greenheck EM-31 Counterbalance Backdraft Damper (Flange on outlet side)	

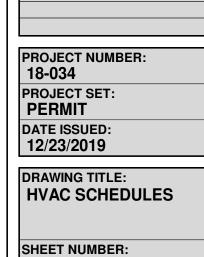
	GRILLES, REGISTERS AND DIFFUSERS SCHEDULE										
ID	DESCRIPTION	MANUFACTURE R	MODEL	QTY	MATERIAL	FINISH	NOTES				
				2							
EG1	EGGCRATE RETURN GRILLE	Titus	50F	7	ALUMINUM	BY ARCH					
LD1	LINEAR SLOT DIFFUSER	Titus	FL-20	10	ALUMINUM	BY ARCH	W/48" LG PLENUM				
RG1	EGGCRATE RETURN GRILLE	Titus	50F	105	ALUMINUM	BY ARCH					
RG2	LOUVERED GRILLE	Titus	355FS	2	ALUMINUM	BY ARCH					
SD1	PERFORATED DIFFUSER WITH DEFLECTORS	Titus	PAS-AA	117	ALUMINUM						
SD2	ROUND DOUBLE DEFLECTION GRILLE	Titus	R300-F	13	ALUMINUM	BY ARCH					







CHARLES COUNTY
CHARLES COUNTY ANIMAL CARE CI
5690 PINEY CHURCH ROAD
WALDORF, MARYLAND 20602



NO. DESCRIPTION DATE





Trane Precedent Gas/Electric Packaged Rooftop

Application	Unit Size	Supp	Supply Fan		nal Dimensior	ıs (in.)	We	EER	IEEF	
DX cooling, gas heat	4 Ton (048)	Airflow	External Static Pressure	Height	Width	Length	Minimum	Maximum	19.4 EER	
Ü		1575 cfm	0.750 in H2O	3.41 ft	4.44 ft	7.39 ft	753.0 lb	1074.0 lb		
	Fresh Air Sele n/Drive/ Motor	w/bar	rel 3ph	J-100 /8		() Trans	1			
Unit Feat		Econ-	comp enthalpy (0-100%						
SupplyFar			Zone VAV eteCoat? w/hail	l quard						
			515 5 541. 17714	guara						
Unit Elec	etrical						IN IN IN		. 9990	
V	oltage/phase/	hertz 208-23	30/60/3						a 8000 m	
•		MCA 0.00 A				7	200		V BBUT	
·		WICA 0.00 A						900		

Unit Controls Microprocessor controls									
Communications Option BACnet Communications Interface									
System Monitoring Controls 1 CFS, FFS & cond DP overflow switch									
Cooling Section									
Entering Dry Bulb	80.20 F	Сара	acity						
Entering Wet Bulb	66.20 F	Gross Total	45.82 MBh						
Ambient Temp	95.00 F	Gross Sensible	37.82 MBh						
Leaving Coil Dry Bulb	57.96 F	Net Total	43.65 MBh						
Leaving Coil Wet Bulb	56.67 F	Net Sensible	35.65 MBh						
Leaving Unit Dry Bulb	59.60 F	Fan Motor Heat	2.18 MBh						
Leaving Unit Wet Bulb	57.31 F	Refrig Charge-circuit 1	6.0 lb						
Refrigeration S	ystem Options								
Leaving Dew Point	55 84 F								

Heat Type Gas I	Heat
Heating Stages 1	
Output Heating Capacity 64.00) MBh
Output Heating Capacity with Fan 66.18	MBh
Heating EAT 57.90) F
Heating LAT 95.80	F
Heating Temp Rise 37.90) F
Fan Section	
Indoor Fan Data	Outdoor Fan Data
Type FC Centrifugal	Type Propeller
Drive Type Variable Direct	Fan Quantity 1
Evan Fan El A 3 30 A	Drive Type Variable Direct

Туре	FC Centritugal	Туре	Propeller
Drive Type	Variable Direct	Fan Quantity	1
Evap Fan FLA	3.30 A	Drive Type	Variable Direct
Indoor Fan I	Performance	Outdoor Fan	Performance
Airflow	1575 cfm	Outdoor Motor Power	0.22 kW
Design ESP	0.750 in H2O	Condenser Fan FLA	2.90 A
Component SP	0.089 in H2O		
Total SP	0.854 in H2O		
Indoor Motor Operating Power	0.62 bhp		
Indoor Motor Power	0.46 kW		
Indoor RPM	911 rpm		
Indoor Fan FLA	2.90 A		
Compressor Section		Accessories	
Po	wer 2.91 kW	Roof curb y	/es
Circuit 1 I	RLA 9.00 A		

Job Name: Charles County Animal Shelter Prepared By: Unit Tag: RTU-1 Quantity: 1

				_				
GENERAL (2)(4)(6)					HEATING PERFORMANCE	i		
Model:	YZC048F3	Overs	ized Motor		HEATING - GENERAL DATA			
Unit Operating Voltage: Unit Primary Voltage: Unit Secondary Voltage Unit Hertz: Unit Phase:	187-253 208 230 60 3	MCA: MFS: MCB:	N/A		Heating Model: Heating Input (BTU): Heating Output (BTU): No. Burmers: No. Stages		Middle 80000 64000 2	
EER / SEER	13.6/19.4				No. Stages		'	
Standard Motor		Field Ir	stalled Oversized Motor	.	Gas Inlet Pressure			
MCA: MFS:	18.0 25.0	MCA: MFS:			Natural Gas (Min/Max): LP (Min/Max)		4.5/14.0	
MCB:	25.0	MCB:			Gas Pipe Connection Size L/M/h		11.0/14.0 1/2"	
INDOOR MOTOR								
Standard Motor			Oversized Motor		F	Field Install	led Oversiz	ed Motor
Number: Horsepower: Motor Speed (RPM): Phase Full Load Amps:	1 1.0 - 1 3.3		Number: Horsepower: Motor Speed (RPM): Phase Full Load Amps:	N/A N/A N/A N/A N/A	, , , , , , , , , , , , , , , , , , ,	Number: Horsepowe Motor Spee Phase Full Load A	d (RPM):	N/A N/A N/A N/A N/A N/A
COMPRESSOR	Circuit 1/2				OUTDOOR MOTOR			
Number: Motor Speed Phase: VFD Input Amps:	1 - Variable Speed 3 - 9.0				Number: 1 Horsepower: 0.50 Motor Speed (RPM): 1100 Phase: 1 Full Load Amps: 2.9			
POWER EXHAUST A			FILTERS		F	REFRIGE	RANT ⁽²⁾	
Phase: Horsepower: Motor Speed (RPM): Full Load Amps: Locked Rotor Amps:	And docty		Type: Furnished: Number Recommended	Yes 4	owaway F	Type Factory Cha Circuit #1 Circuit #2	R-41 arge 6" -	0A

NOTES:

1. Maximum (HACR) Circuit Breaker sizing is for installations in the United States only.

2. Refrigerant charge is an approximate value. For a more precise value, see unit nameplate and service instructions.

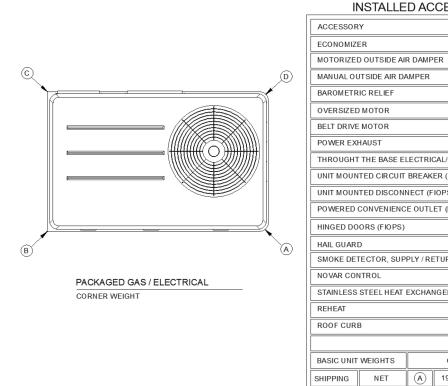
3. Value does not include Power Exhaust Accessory.

4. Value includes oversized motor.

5. Value does not include Power Exhaust Accessory.

6. EER is rated at AHRI conditions and in accordance with DOE test procedures.





ACCESS	ACCESSORY							
ECONON	ECONOMIZER							
MOTORI	ZED OUTSIDE A	R DAMP	PER					
MANUAL	OUTSIDE AIR D	AMPER						
BAROME	TRIC RELIEF							
OVERSIZ	ED MOTOR							
BELT DR	IVE MOTOR							
POWER	EXHAUST							
THROUG	HT THE BASE E	LECTRI	CAL/GAS (FIC	PS)			18.0 lb	
UNIT MO	UNTED CIRCUIT	BREAK	ER (FIOPS)				5.0 lb	
UNIT MO	UNTED DISCON	NECT (F	IOPS)					
POWERE	D CONVENIENC	E OUTL	ET (FIOPS)					
HINGED	DOORS (FIOPS)							
HAIL GU	ARD						20.0 lb	
SMOKE	DETECTOR, SUF	PLY / RE	ETURN					
NO VAR (ONTROL							
STAINLE	SS STEEL HEAT	EXCHAI	NGER					
REHEAT	REHEAT							
ROOF C	ROOF CURB							
BASIC U	NIT WEIGHTS		CORNER	WEIGHT	S	CE	NTER OF	GRAVITIY
SHIPPING	NET	A	196.0 lb	©	126.0 lb	(E) I	ENGHT	(F) WIDTH
848.0 lb	753.0 lb	(B)	258.0 lb	(D)	173.0 lb	40	,	23"

NOTE:

1. All weights are approximate.

2. Weights for options that are not list refer to Installation guide.

3. The actual weight are listed on the unit nameplate.

4. Refer to unit nameplate and installation guide for weights before scheduling transportation and installation of unit The weight shown represents the typical unit operating weight for the configuration selected. Estimated at +/- 10 % of the nameplate weight.

Verify weight, connection, and all dimension with installer documents before installation.

Corner weights are given for information only.

Net/Shipping weight of optional accessories should be added to unit weight when ordering factory or field installed accessories. PACKAGED GAS / ELECTRICAL RIGGING AND CENTER OF GRAVITY

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RTU-2



MOP 40.00 A

Circuit 2 RLA 0.00 A

Trane Precedent Gas/Electric Packaged Rooftop

Application	Unit Size	Supp	ly Fan	External Dimensions (in.)			Weight		EER	IEER/SEER	Elevat
DX cooling,	5 Ton (060)	Airflow	External Static Pressure	Height	Width	Length	Minimum	Maximum	19.6 EER		
gas heat	` '	1600 cfm	0.750 in H2O	3.41 ft	4.44 ft	7.39 ft	854.0 lb	1133.0 lb			
Unit Fea	itures										
		torType Sin	on-comp enthoar rel 3ph	<i>t</i>							
SupplyFa	n/Drive/ Mot Panels	torType Sin	oar rel 3ph	<i>t</i>							
SupplyFa Unit Elec	n/Drive/ Mot Panels	torType Sin	oar rel 3ph Igle Zone VA\ mpleteCoat?	<i>t</i>							

Controls				
	Unit Controls M	Micropr	ocessor controls	
	Communications Option B	3ACnet	Communications Interface	
Sy	stem Monitoring Controls 1	CFS, F	FS & cond DP overflow switch	
Cooling Section				
Entering Dry Bulb	82.00 F		Сара	acity
Entering Wet Bulb	67.00 F		Gross Total	58.62 MBh
Ambient Temp	95.00 F		Gross Sensible	46.43 MBh
Leaving Coil Dry Bulb	55.13 F		Net Total	56.72 MBh
Leaving Coil Wet Bulb	54.91 F		Net Sensible	44.53 MBh
Leaving Unit Dry Bulb	56.78 F		Fan Motor Heat	1.90 MBh
Leaving Unit Wet Bulb	55.57 F		Refrig Charge-circuit 1	12.0 lb
Refrigeration S	System Options			
Leaving Dew Point	54.76 F			

Heating Section		
Heat Type Gas	-leat	
Heating Stages 1		
Output Heating Capacity 64.00) MBh	
Output Heating Capacity with Fan 65.90) MBh	
Heating EAT 50.20) F	
Heating LAT 87.50) F	
Heating Temp Rise 37.30) F	
Fan Section		
Indoor Fan Data	Outdoor	Fan Data
Type FC Centrifugal	Туре	Propeller
Drive Type Variable Direct	Fan Quantity	1
Evap Fan FLA 3.30 A	Drive Type	Variable Direct
Indoor Fan Performance	Outdoor Fan	Performance
Airflow 1600 cfm	Outdoor Motor Power	0.28 kW
Design ESP 0.750 in H2O	Condenser Fan FLA	2.40 A
Component SP 0.090 in H2O		
Compensation C. Cook in Tile		
Total SP 0.858 in H2O		

Compressor Section	Accessories
Power 3.92 kW	Roof curb yes
Circuit 1 RLA 16.00 A	
Circuit 2 RLA 0.00 A	

Page 1 of 17

		Ē	ELECTRICAL / (GE	ENERAL DATA		
GENERAL (2)(4)(6) Model: Unit Operating Voltage: Unit Primary Voltage: Unit Secondary Voltage Unit Hertz: Unit Phase: EER / SEER Standard Motor MCA: MFS: MCB:	YZ C060E3 187-253 208 230 60 3 12.9/19.4 26.0 40.0	MCA: MFS: MCB: Field Ins	N/A N/A stalled Oversized Motor N/A N/A		HEATING PERFORMAN HEATING - GENERAL DAT. Heating Model: Heating Input (BTU): No. Burners: No. Stages Gas Inlet Pressure Natural Gas (Min/Max): LP (Min/Max) Gas Pipe Connection Size L	A	Middle 80000 64000 2 1 4.5/14.0 11.0/14.0 1/2"
Horsepower: Motor Speed (RPM): Phase Full Load Amps:	1 1.0 - 1 3.3 - -		Horsepower. Motor Speed (RPM): Phase Full Load Amps:	N/A N/A N/A N/A N/A	\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	Number: Horsepov	eed (RPM): N/A N/A
Number: Motor Speed Phase: VFD Input Amps:	Gircuit 1/2				Number: 1 Horsepower: 0.5 Motor Speed (RPM): 11 Phase: 1 Full Load Amps: 2.4		
POWER EXHAUST A (Field Installed Power E: Phase: Horsepower: Motor Speed (RPM): Full Load Amps: Locked Rotor Amps:			Furnished: Number	Yes 4	owaway : :x25"x2"	REFRIG Type Factory C Circuit #1 Circuit #2	11.9 lb

NOTES:

1. Maximum (HACR) Circuit Breaker sizing is for installations in the United States only.

2. Refrigerant charge is an approximate value. For a more precise value, see unit nameplate and service instructions.

3. Value does not include Power Exhaust Accessory.

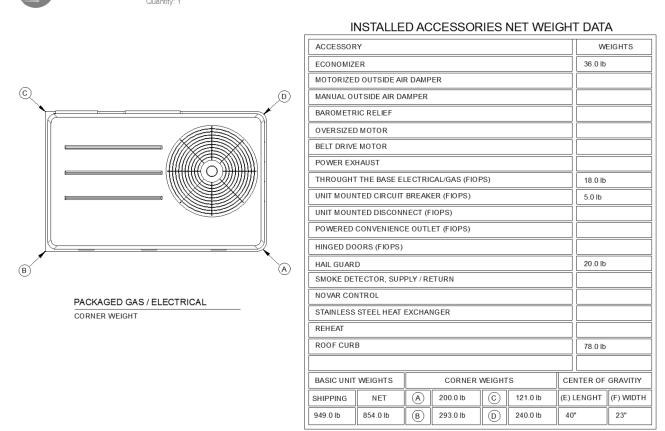
4. Value includes oversized motor.

5. Value does not include Power Exhaust Accessory.

6. EER is rated at AHRI conditions and in accordance with DOE test procedures.

7. Installation of this power exhaust kit will affect unit level MCA and could affect MOP sizing having a direct impact on existing field wiring and unit protection devices. The change in MCA/MOP is the sole responsibility of the field installing party. Trane will not issue new nameplates as a result of this power exhaust accessory installation. FLA of the power exhaust kit option must be added to the MCA of the unit for building supply conductor sizing determination.





NOTE:

1. All weights are approximate.

2. Weights for options that are not list refer to Installation guide.

3. The actual weight are listed on the unit nameplate.

4. Refer to unit nameplate and installation guide for weights before scheduling transportation and installation Refer to unit nameplate and installation guide for weights before scheduling transportation and installation of unit.
 The weight shown represents the typical unit operating weight for the configuration selected. Estimated at +/-10 % of the nameplate weight.
 Verify weight, connection, and all dimension with installer documents before installation.
 Corner weights are given for information only.
 Net/Shipping weight of optional accessories should be added to unit weight when ordering factory or field installed accessories.

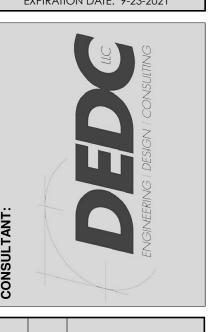
Page 7 of 18

PACKAGED GAS / ELECTRICAL

2019-12-04 17:22:30Z

ARCHITECTURE + MASTER PLANNING 10839-D PHILADELPHIA RD WHITE MARSH, MD 21162 (P) 410-344-1460 (F) 443-403-2460 (E) INFO@MWSARCH.COM www.mwsarch.com

I HEREBY CERTIFY THAT THESE DOCUMENTS WERE PREPARED OR APPROVED BY ME, SCOTT A. FRENCK, PE, AND THAT I AM A DULY LICENSED PROFESSIONAL ENGINEER UNDER THE LAWS OF THE STATE OF MARYLAND. LICENSE NUMBER: #47259 EXPIRATION DATE: 9-23-2021



CARE

DATE ISSUED: 12/23/2019 DRAWING TITLE: HVAC SCHEDULES

PROJECT NUMBER:

PROJECT SET:

18-034

NO. DESCRIPTION DATE

Supply Motor Horsepower 1.000 hp Indoor Motor Operating Power 0.52 bhp Indoor Motor Power 0.39 kW Indoor RPM 903 rpm Indoor Fan FLA 2.40 A

<u>RTU-3</u>



Trane Precedent Gas/Electric Packaged Rooftop

Application	Unit Size	Supp	ly Fan	External Dimensions (in.)			Weight		EER	IEER/SEE
DX cooling, gas heat	7.5 Ton Single	Airflow	External Static Pressure	Height	Width	Length	Minimum	Maximum	12.8 EER	22.40
J	compressor	2702 cfm	0.750 in H2O	3.91 ft	4.44 ft	7.39 ft	909.0 lb	1193.0 lb		
	resh Air Sele n/Drive/ Motor Panels/F	Type Single	comp enthalpy (rel 3ph Zone VAV eteCoat? w/hai			0				
Unit Elec	trical					- 80	No.			
	oltage/phase/	hertz 208-23	30/60/3			-	-0			
	• •	MCA 0.00 A				-				
		MOP 0.00 A						. 1	. 1957	

Unit Controls Microprocessor controls						
	Communications Option BACnet	Communications Interface				
Sy	stem Monitoring Controls 1 CFS, F	FS & cond DP overflow switch				
Cooling Section						
Entering Dry Bulb	79.50 F	Сара	acity			
Entering Wet Bulb	64.30 F	Gross Total	87.12 MBh			
Ambient Temp	95.00 F	Gross Sensible	76.12 MBh			
Leaving Coil Dry Bulb	53.13 F	Net Total	84.00 MBh			
Leaving Coil Wet Bulb	53.04 F	Net Sensible	73.00 MBh			
Leaving Unit Dry Bulb	54.82 F	Fan Motor Heat	3.12 MBh			
Leaving Unit Wet Bulb	53.76 F	Refrig Charge-circuit 1	8.7 lb			
Refrigeration S	ystem Options					
Leaving Dew Point	52.99 F					
Heating Section						
	Heat Type Gas He	at				
	Heating Stages 1					
	Output Heating Capacity 97.20 M	1Bh				

	a map and a second of the second						
Outpu	t Heating Capacity with Fan 99.85 M	1Bh					
	Heating EAT 59.40 F						
	Heating LAT 93.00 F						
	Heating Temp Rise 33.60 F						
Fan Section							
Indoor F	an Data	Outdoor	Fan Data				
Drive Type	Variable Direct	Туре	Propeller				
Evap Fan FLA	7.30 A	Fan Quantity	1				
Indoor Fan I	Performance	Drive Type	Variable Direct				
Airflow	2702 cfm	Outdoor Fan	Performance				
Design ESP	0.750 in H2O	Condenser Fan FLA	5.70 A				
Component SP	0.125 in H2O						
Total SP	0.897 in H2O						
Indoor Motor Operating Power	0.90 bhp						
Indoor Motor Power	0.67 kW						
Indoor RPM	1100 rpm						
Indoor Fan FLA	5.70 A						
Compressor Section		Accessories					
Po	wer 3.38 kW	Roof curb	yes				

Circuit 2 RLA 0.00 A

2019-08-27 15:01:50Z

Page 1 of 16

Job Name: Charles County Animal Shelter Prepared By: Unit Tag: RTU-3 Quantity: 1

I	ELECTRICAL / G	ENERAL DATA	
Wordst	B: N/A I Installed Oversized Motor	HEATING PERFORMANCE HEATING - GENERAL DATA Heating Model: Heating Input (BTU): Heating Output (BTU): No. Burners: No. Stages Gas Inlet Pressure Natural Gas (Min/Max): LP (Min/Max) Gas Pipe Connection Size L/M/	Low 120000 97200 3 1 4.5/14.0
INDOOR MOTOR Standard Motor Number: 1 Horsepower: 2.75 Motor Speed (RPM): Direct/Variable Phase 3 Full Load Amps: 7.3 COMPRESSOR Circuit 1/2	Oversized Motor Number: N. Horsepower: N. Motor Speed (RPM): N. Phase N. Full Load Amps: N.	A A A A A A A A A A A A A A A A A A A	Field Installed Oversized Motor Number: N/A Horsepower: N/A Motor Speed (RPM): N/A Phase N/A Full Load Amps: N/A N/A
Number: 1 Motor Speed -		Number: 1 Horsepower: 0.75 Motor Speed (RPM): 1200 Phase: 1 Full Load Amps: 5.7	
POWER EXHAUST ACCESSORY (Field Installed Power Exhaust) Phase: Horsepower: Motor Speed (RPM): Full Load Amps: Locked Rotor Amps:	Furnished: Ye Number 4	nrowaway ss F	REFRIGERANT (2) Type R-410A Factory Charge Circuit #1 8.7 lb Circuit #2 -

NOTES:

1. Maximum (HACR) Circuit Breaker sizing is for installations in the United States only.

2. Refrigerant charge is an approximate value. For a more precise value, see unit nameplate and service instructions.

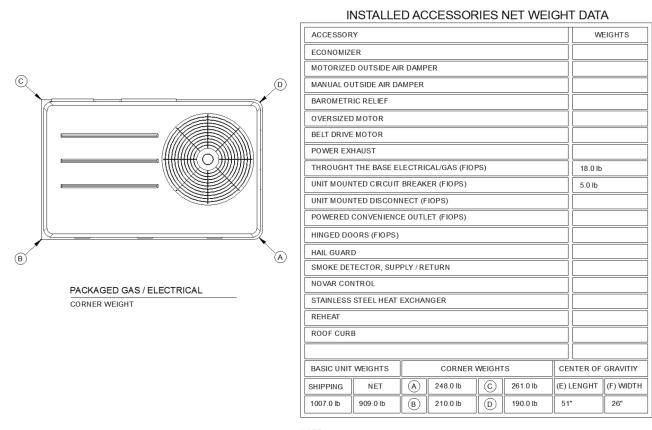
3. Value does not include Power Exhaust Accessory.

4. Value includes oversized motor.

5. Value does not include Power Exhaust Accessory.

6. EER is rated at AHRI conditions and in accordance with DOE test procedures.

Job Name: Charles County Animal Shelter Prepared By: Unit Tag: RTU-3 Quantity: 1



NOTE:
1. All weights are approximate.
2. Weights for options that are not list refer to Installation guide.
3. The actual weight are listed on the unit nameplate.
4. Refer to unit nameplate and installation guide for weights before scheduling transportation and installation of unit.
5. The weight shown represents the typical unit operating weight for the configuration selected. Estimated at +/- 10 % of the nameplate weight.
6. Verify weight, connection, and all dimension with installer documents before installation.
7. Corner weights are given for information only.
8. Net/Shipping weight of optional accessories should be added to unit weight when ordering factory or field installed accessories.

PACKAGED GAS / ELECTRICAL
RIGGING AND CENTER OF GRAVITY

2019-08-27 15:01:50Z Page 4 of 16 2019-08-27 15:01:50Z

<u>RTU-4</u>

Job Name: Charles County Animal Shelter Prepared By:
Unit Tag: RTU-4
Ouestite: 1

Trane Precedent Gas/Electric Packaged Rooftop

Circuit 1 RLA 21.50 A

Application	Unit Size	Supp	oly Fan	Exterr	nal Dimension	ns (in.)	Wei	ight	EER	IEEF
DX cooling, gas heat	6 Ton Single compressor	Airflow	External Static Pressure	Height	Width	Length	Minimum	Maximum	12.8 EER	2
J		2068 cfm	0.750 in H2O	3.91 ft	4.44 ft	7.39 ft	868.0 lb	1188.0 lb		
									. 400/00/00/00	
Unit Elec	ctrical		leteCoat? w/hail	guard			IN IN IN			
	etrical /oltage/phase/		30/60/3	guard		'	100			

Controls			
	Unit Controls Micropro	ocessor controls	
	Communications Option BACnet	Communications Interface	
Sy	stem Monitoring Controls 1 CFS, F	FS & cond DP overflow switch	
Cooling Section			
Entering Dry Bulb	80.80 F	Capa	acity
Entering Wet Bulb	67.10 F	Gross Total	69.51 MBh
Ambient Temp	95.00 F	Gross Sensible	54.23 MBh
Leaving Coil Dry Bulb	56.07 F	Net Total	67.73 MBh
Leaving Coil Wet Bulb	55.97 F	Net Sensible	52.45 MBh
Leaving Unit Dry Bulb	57.52 F	Fan Motor Heat	1.78 MBh
Leaving Unit Wet Bulb	56.55 F	Refrig Charge-circuit 1	8.3 lb
Refrigeration S	ystem Options		
Leaving Dew Point	55.92 F		

	Heat Type Ga	as Heat		
	Heating Stages 1			
	Output Heating Capacity 97	'.20 MBh		
Outpu	t Heating Capacity with Fan 99	.09 MBh		
	Heating EAT 52	2.10 F		
	Heating LAT 95	5.90 F		
	Heating Temp Rise 43	8.80 F		
Fan Section				
Indoor F	an Data		Outdoor	Fan Data
Drive Type	Variable Direct		Туре	Propeller
Evap Fan FLA	7.30 A		Fan Quantity	1
Indoor Fan I	Performance		Drive Type	Variable Direct
Airflow	2068 cfm		Outdoor Fan	Performance
	0.750 in H2O		Condenser Fan FLA	5.70 A
Component SP	0.096 in H2O			
Total SP	0.863 in H2O			
Indoor Motor Operating Power	0.63 bhp			
Indoor Motor Power	0.47 kW			
Indoor RPM	966 rpm			
Indoor Fan FLA	5.70 A			
Compressor Section			Accessories	
	wer 3.46 kW		Roof curb y	res

Page 1 of 17

Circuit 1 RLA 20.80 A

Circuit 2 RLA 0.00 A

Job Name: Charles County Animal Shelter
Prepared By:
Unit Tag: RTU-4
Quantity: 1

GENERAL (2)(4)(6)					HEATING PERFORMANC	E		
Model:	YZ*0072F3	Oversi	ized Motor		HEATING - GENERAL DATA			
Unit Operating Voltage: Unit Primary Voltage: Unit Secondary Voltage Unit Hertz: Unit Phase:	208	MCA: MFS: MCB:	N/A		Heating Model: Heating Input (BTU): Heating Output (BTU): No. Burners: No. Stages		Medium 120000 97200 3	
EER / SEER	12.6/23.2				No. Stages		'	
Standard Motor		Field In	stalled Oversized Motor		Gas Inlet Pressure			
MCA: MFS: MCB:	39.0 50.0 50.0	MCA: MFS: MCB:	N/A		Natural Gas (Min/Max): LP (Min/Max) Gas Pipe Connection Size L/M	I/H/Mod:	4.5/14.0 11.0/14.0 1/2"/1/2"/3/4	4 "
INDOOR MOTOR								
Standard Motor			Oversized Motor			Field Insta	alled Oversize	ed Motor
Number: Horsepower: Motor Speed (RPM): Phase Full Load Amps:	1 2.75 Direct/Variable 3 7.3		Number: Horsepower: Motor Speed (RPM): Phase Full Load Amps:	N/A N/A N/A N/A N/A		Number: Horsepow Motor Spe Phase Full Load	ed (RPM):	N/A N/A N/A N/A N/A N/A
COMPRESSOR	Circuit 1/2				OUTDOOR MOTOR			
Number: Motor Speed Phase: VFD Input Amps:	1 - Variable Speed 3 - 20.8				Number: 1 Horsepower: 0.75 Motor Speed (RPM): 1200 Phase: 1 Full Load Amps: 5.7			
POWER EXHAUST A			FILTERS				ERANT (2)	0.4
Phase: Horsepower: Motor Speed (RPM): Full Load Amps: Locked Rotor Amps:			Type: Furnished: Number Recommended	Yes 4	owaway x25"x2"	Type Factory Ch Circuit #1 Circuit #2	R-410 narge 8.3 lb -	

NOTES:

1. Maximum (HACR) Circuit Breaker sizing is for installations in the United States only.

2. Refrigerant charge is an approximate value. For a more precise value, see unit nameplate and service instructions.

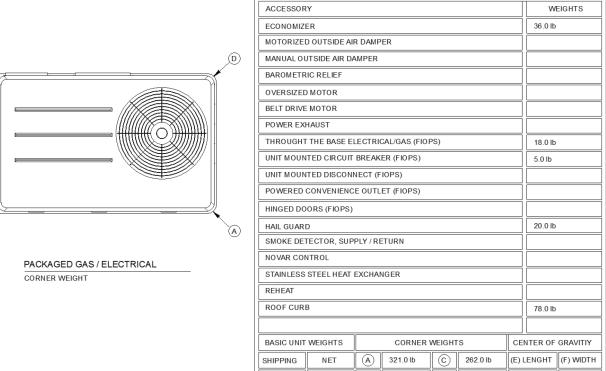
3. Value does not include Power Exhaust Accessory.

4. Value includes oversized motor.

5. Value does not include Power Exhaust Accessory.

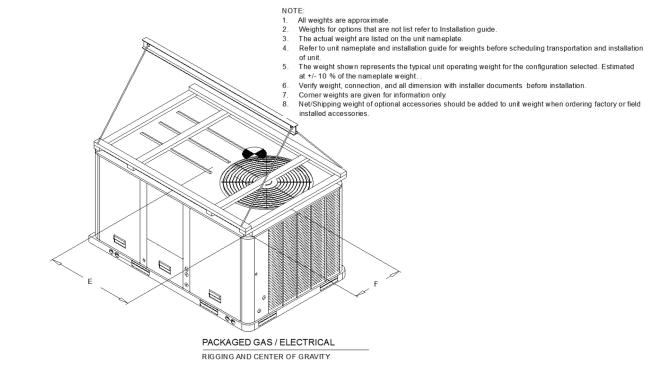
6. EER is rated at AHRI conditions and in accordance with DOE test procedures.





INSTALLED ACCESSORIES NET WEIGHT DATA

966.0 lb 868.0 lb B 184.0 lb D 101.0 lb 64" 22"



 STUDIOS

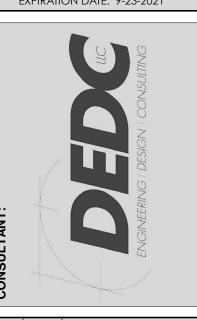
ARCHITECTURE + MASTER PLANNING

10839-D PHILADELPHIA RD
WHITE MARSH, MD 21162

(P) 410-344-1460
(F) 443-403-2460
(E) INFO@MWSARCH.COM

www.mwsarch.com

I HEREBY CERTIFY THAT THESE
DOCUMENTS WERE PREPARED OR
APPROVED BY ME, SCOTT A. FRENCK, PE,
AND THAT I AM A DULY LICENSED
PROFESSIONAL ENGINEER UNDER THE
LAWS OF THE STATE OF MARYLAND.
LICENSE NUMBER: #47259
EXPIRATION DATE: 9-23-2021



CHARLES COUNTY
CHARLES COUNTY ANIMAL CARE CENTER
5690 PINEY CHURCH ROAD
WALDORF, MARYLAND 20602

PROJECT NUMBER:
18-034
PROJECT SET:
PERMIT
DATE ISSUED:
12/23/2019

NO. DESCRIPTION DATE

DRAWING TITLE:
HVAC SCHEDULES

SHEET NUMBER: M603

2019-08-27 15:01:50Z

ANIMAL SYSTEM 1

Charles County Animal Shelter September 13, 2019 Product Data - Horizon™ - Outdoor Air Unit (Revision 6) D012 day Horizon™ - Outdoor Air Unit (Revision 6) OADG012C1-DAB10AF00-G1AEE3AE0-11A31C11B-Tag(s): AS-1

Unit Voltage: 208-3-60 Curb Selection: Seismically Rated - HD Energy Recovery Wheel Cabinet Warranty: 1-Year Parts Only (manufacturer warranty) Warranty: 5-Year Digital/Variable Speed/Standard Scroll Compressor / 25-Year Heat Exchanger Airflow Configuration: Vertical Discharge/Vertical Return Indoor Coil Type: DX 6-Row Reheat: Fin & Tube Modulating HGRH Compressor: Digital Scroll-1st Circuit Only

Outdoor Coil Type: Air Cooled Fin & Tube Heat Type - Primary: [OAD] Indirect Fired NG (IF) - Standard Efficiency (80%) Heat Capacity - Primary: 200 MBH, (10:1 Turndown NG, 8:1 Turndown LP) Supply Fan Motor Type: Direct Drive w/VFD Exhaust Fan Motor Type: Direct Drive w/Shaft Grounding Ring w/VFD Unit Controls: Space Control - UC600 Building Interface: BACnet Filter Options: MERV-8,30%

Energy Recovery: ERV-Aluminum Construction with Frost Control and Bypass Energy Recovery Wheel Options: Purge Energy Recovery Wheel Size: ERC-4136A ERV Rotation sensor: Rotation sensor Damper Options: 100% OA 2-Position Damper Exhaust Dampers: Isolation Dampers Electrical Options: Non-Fused Disconnect Condenser Fan Options: Standard Condenser Fan Hailguards: Hailguards Installation: Outdoor

Controls Display: TD7 Factory Installed Cooling Controls: Reliatel Supply Discharge Air Sensor (FLD) 2 inch Double Wall Construction Stainless Steel Drip Pan Blower HP - 3 Blower RPM - 2013 Supply Fan - ANPA 16 Exhaust RPM - 1933 Exhaust HP - 2 Exhaust Fan - ANPA 16 Unit Amps - FLA: 64.6 Amps Min Circuit Ampacity - MCA: 69.7 Amps

Maximum Fuse Size - MFS: 90 Amps

FLD = Furnished by Trane / Installed by Others

<u>Tag:</u> AS-1		Cor	mments:					
Jnit Information								
Model:	Horizon™		Unit Length:	214 in	Weight Oper	ating:	3982	lb*
	Rev6 OADG/O							de CURB weight.
Size:	D012	,	Unit Width:	95 in	See C	URB s	ubmittal fo	or actual
Quantity:	1		Unit Height:	68 in	Refrigerant Cha	rge		
Supply Airflow:	3,291	CFM	Elevation:	0 ft	Circuit 1:	33	lbs	
Outside Airflow:	3,291	CFM	Ambient Air DB:	95 F				
Minimum Airflow:	1,475	CFM						
Cooling Performance	!							
Gross Total (Capacity:		153.9 MBh		Evaporator Face	Area:	10.42	sq ft
Gross Sensible (Capacity:		99.2 MBh	į.	Evaporator Rows	FPI:	6 / 14	
Net Total C	Capacity:		149 MBh		Condenser Face	Area:	30	sq ft
Net Sensible 0	Capacity:		94.3 MBh	C	ondenser Rows /	FPI:	2 / 14	
Entering Air DB / W	/B (Coil):	80.8 / 6	8.5 F		Air Vel	ocity:	315	fpm
Leaving Air DB / W	/B (Coil):	53.5 / 5	3.5 F		Coil Ai	r PD:	0.38	in H2O
Leaving Air DB / WB (Reheat):	77.2 / 6	2.56 F			EER:	20	
Leaving Air DB / W	/B (Unit):	78.8 / 6	3.1 F		V	/atts:	13640	
	MRC:	!	99.05 lb/h		1	MRE:	7.26	lb/kWh
leating Performance								
Heat Type:	Gas Furn	ace		Entering Air D	DB: 49 .	7 F		
Input Capacity	200	MBh		Leaving Air [DB: 94.	7 F		
Output Capacity:	160) MBh		Coil Air F	PD: 0.2	8 in H2	20	

Airflow: 3,291 CFM

DB: **49.7** F

Airflow: 3,385 CFM

DB: **70.0** F

WB: **58.0** F

WB: 44.8 F

PD: **0.75** in H20

Airflow: 3,397 CFM**

DB: **0.0** F

WB: **0.0** F

Airflow: 3,491 CFM

DB: **21.7** F

WB: **21.7** F

ESP: **1.00** in H20 ERV PD: **0.81** in H20

Energy Wheel will be in frost at these design conditions

Sensible Capacity: 182.30 MBH Eff: 0.71

Latent Capacity: 62.80 MBH Eff: 0.65

Latent Capacity: 20.43 MBH Eff: 0.72

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Total Capaciy: 245.10 MBH

Airflow: 3,291 CFM

WB: **68.5** F

Return

Airflow: 3,385 CFM

DB: **75.0** F

WB: **63.0** F

PD: **0.85** in H20

DB: **80.8** F

Airflow: **3,397** CFM**

Airflow: 3,491 CFM

DB: 88.8 F

WB: **73.3** F

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

ESP: **1.00** in H20 ERV PD: **0.87** in H20

Sensible Capacity: 52.10 MBH Eff. 0.71

Latent Capacity: 71.96 MBH Eff: 0.65

Latent Capacity: 25.84 MBH Eff: 0.72

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

Total Capaciy: 124.06 MBH

DB: **95.0** F

WB: **78.0** F

nty Animal	Shelter			September 13,	3, 2019 Charles County	Animal Shelter			Septem
	Con	mments:			Supply Fan	ANPA 16			
Model: H Size: Quantity: y Airflow: e Airflow:	orizon™ (OAD/N Rev6 - OADG/OANG) D012 1 3,291 CFM 3,291 CFM 1,475 CFM	Unit Length: Unit Width: Unit Height: Elevation: Ambient Air DB:		does not include CURB weight. RB submittal for actual	4 - (3M(u)) anssend			- 1.9 Brake Horse Pow	— Selection RPM User Selection
rmance Des Total Ca Sensible Ca Net Total Ca Sensible Ca Air DB / WB Air DB / WB	pacity: pacity: pacity: pacity: (Coil): 80.8 / 6		Evaporator Face Are Evaporator Rows / F Condenser Face Are Condenser Rows / FF Air Veloci Coil Air P	PI: 6 / 14 ea: 30 sq ft PI: 2 / 14 ty: 315 fpm	0 - 2000	2500 3000 Vo	3500 4000 4500 lume (CFM)	1.5 5000	- BHP
DB / WB (Re	eheat): 77.2 / 6	2.56 F	EE	:R: 20	Supply Pressur	re Drop Summary	<u> </u>	Supply Fan Conditio	<u>ns</u>
	. ,	3.1 F 99.05 lb/h	Wat MF		External \$	Static Pressure: Cabinet: Cooling Coil:	1.00 in H2O 0.01 in H2O 0.38 in H2O	Fan Motor BHP: Operating RPM: Minimum RPM:	1.94 BHP 2013 RPM 1359 RPM
<u>rmance</u>						Base Filter:	0.01 in H2O		
*'	Gas Furnace		Entering Air DB: 49.7			Filter:	0.03 in H2O		
pacity	200 MBh		Leaving Air DB: 94.7			Primary Heat:	0.28 in H2O		
acity:	160 MBh		Coil Air PD: 0.28	in H2O		HGRH:	0.02 in H2O		
ery Whee	<u>el</u> ERC-4136 <i>I</i>	A	** TAB Outside airflow	through OA Intake to this value		ERV OA:	0.85 in H2O		
Summer	Conditions		Winter Con	ditions		Outdoor:	0.04 in H2O		
upply	Outsi	ide	Ventilation Supply	<u>Outside</u>	Total S	Static Pressure:	2.62 in H2O		
					1				

Charles County Animal Shelter September 13, 2019

Charles County Animal Shelter September 13, 2019 Exhaust Fan ANPA 16 ---- Selection RPM User Selection 1500 2000 2500 3000 3500 4000 4500 5000 Volume (CFM) **Exhaust Pressure Drop Summary Exhaust Fan Conditions** Return External Static Pressure: 1 in H2O Fan Motor BHP: ERV Return Filter PD: **0.2** in H2O Operating RPM: 1933 RPM ERV Wheel PD: **0.87** in H2O Total Exhaust Static Pressure **Unit Electrical Data** Unit Voltage-Ph-Hz: 208-3-60 Min Circuit Ampacity - MCA: **69.7** Amps **64.6** Amps Maximum Fuse Size - MFS: Unit Amps - FLA: **90** Amps Electrical Summary Oty HP (ea.) FLA (ea.) RLA (ea.) LRA (ea.) Component ERV/HRV

1 0.07 0.38 20.4 156 Digital Scroll

Standard Radiated Sound Power Level (dBA) 63 125 250 500 1000 2000 4000 8000 Total dBA 59.7 69.7 76.7 81.7 81.7 81.7 82.7 78.7 88.7 Sound power levels are listed for informational purposes only and are not guaranteed.

 See option list schedule for selected options. See catalog for dimension and weight. Unit Electrical amps include the greater of compressor or electrical heat amps. • Unit's electrical as shown above are for single point power. If dual power is required please contact the factory.

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

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ANIMAL SYSTEM 1A PROVIDE FOR: ALTERNATE 004 - SPRAY/NEUTER CLINIC FIT-OUT **Charles County Animal Shelter**

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September 13, 2019 Product Data - Horizon™ - Outdoor Air Unit (B/G) Size Qty Model Number B048 1 Horizon™ - Outdoor Air Unit (B/G) OABD048A3-C1B100AB-A1B00AG8AB1C10B3C4C0

Tag(s): AS1A Unit Voltage: 208-3-60 Airflow Configuration: Vertical Discharge/Vertical Return Installation: Outdoor Evaporator Coil: DX 4 Row Interlaced Hot Gas Reheat: Modulating Compressor: Digital Scroll Primary Circuit Condenser: Air Cooled Indoor Blower Motor: ECM w/ Backward Curved Plenum Fan Heat Type: Indirect Fired (IF) Fuel Type: Natural Gas 439 Stainless Steel Furnace: 75 Mbtu/h, (5:1 Turndown NG, 4:1 Turndown LP) Unit Controls: Trane UC600 - Space Control w/BACNET w/Display Powered Exhaust: ECM w/ Backward Curved Plenum Fan w/Isolation Dampers ERV/HRV: ERV - Aluminum Construction w/ Bypass Dampers Energy Recovery & Conservation: ERC-3014A Damper Options: 2-Position Outdoor Air Damper Filters: MERV-8 Smoke Detectors: Supply & Return Electrical Options: Non-Fused Disconnect Switch w/ 115v Outlet (B/G) Air Flow Monitoring: IFM Piezo Ring and PE Piezo Ring/Tap Accessories: Condenser Hailguard + LED Service Light Warranty: 1-Year Parts Only (manufacturer warranty) Warranty: 5-Year Digital/Variable Speed Scroll Compressor Supply Discharge Air Sensor (FLD) 2 inch Double Wall Construction Stainless Steel Drip Pan Blower HP - 2.5 Blower RPM - 1760 Supply Fan - GKHM_355 Exhaust RPM - 1727 Exhaust HP - 2.5

Tag: AS1A		Comments:							
Unit Information									
Model	: Horizon™ (yth: 161 i	in	Weight	Operat	ing:	185	57 lb*
Size	Rev5) Unit Wic	dth: 52 i	in					ude CURB weigh for actual
Quantity		Unit Heig						Jiiiillai	IOI actual
Supply Airflow			•		Refrigeran		-		
Outside Airflow	•	CFM Ambient Air [DB: 95 I	F	Circuit 1:		15.29	bs	
Minimum Airflow	553	CFM							
Cooling Performanc	<u>e</u>								
Gross Total	Capacity:	49.9 MBh			Evaporator I	Face A	rea:	4.1	7 sq ft
Gross Sensible	Capacity:	32.3 MBh			Evaporator F	Rows/I	FPI:	4 / 12	
Net Total	Capacity:	48.1 MBh			Condenser I	Face A	rea:	10.8	3 sq ft
Net Sensible	Capacity:	30.5 MBh			Condenser R	lows / F	PI:	2 / 14	
Entering Air DB /	WB (Coil): 7	9.9 / 67.4 F			А	ir Velo	city:	25	9 fpm
Leaving Air DB /	WB (Coil): 5	2.9 / 52.3 F			C	Coil Air	PD:	0.1	3 in H2O
Leaving Air DB / WB	(Reheat): 82	2.59 / 63.64 F				E	ER:	20.	.2
Leaving Air DB /	WB (Unit): 8	4.4 / 64.3 F					atts:	461	
	MRC:	31.74 lb/h				М	RE:	6.8	8 lb/kWh
Heat Type: Input Capacity Output Capacity:		MBh MBh	Enterir Leavir Co	-	DB:	104.3 0.12	F in H20)	
Energy Recovery W	heel ERC	-3014A			** TAB Outside	e airflo	v throug	gh OA II	ntake to this value
Summ	ner Conditio	ns			Wint	ter Co	nditior	าร	
Ventilation Supply		<u>Outside</u>	Ve	entila	tion Supply			Out	side
Airflow: 1,084 CFM	Airf	ow: 1,169 CFM**	Airfle	ow:	1,084 CFM		Airf	low:	1,169 CFM**
DB: 79.9 F		DB: 95.0 F	I	OB:	53.0 F			DB:	0.0 F
WB: 67.5 F	E	VB: 78.0 F	V	VB:	47.4 F	E	,	WB:	0.0 F
PD: 0.49 in H20	- R		F	PD:	0.44 in H20	0 — R			
Return		Exhaust		E	<u>Return</u>			Exh	aust
Airflow: 1,084 CFM	Airf	ow: 1,169 CFM	Airfle	ow:	1,084 CFM	~	Airf	low:	1,169 CFM
DB: 75.0 F		DB: 90.1 F		DB:	70.0 F			DB:	17.0 F
WB: 63.0 F		VB: 74.5 F	٧	VB:	58.0 F		,	WB:	17.0 F
ESP: 1.00 in H20	ERV	PD: 0.49 in H20	E	SP:	1.00 in H20	o 📙	ERV	PD:	0.45 in H20
				Ener	gy Wheel will l	be in fr	ost at th	ese de:	sign conditions
Total Capaciy:	14.94 MBH			Tot	al Capaciy:	87.30	MBH	+	
Sensible Capacity:	19.10 MBH	Eff. 0.76	Se	nsibl	e Capacity:	66.88	MBH	4	Eff: 0.76
1 -44 0									

	GKHM_355			
2.5			 0.9	
2.5				
.1~			- 0.8 _m	
Q 2			- 2	
<u> </u>			- 0.7 $\hat{\mathbb{P}}$	
© 1.5 –	****		- 3	
nss.	Amma		- 0.6 °B	Selection RPM
문 1 -				User Selection BHP
Static Pressure (in.WC)	April 1		Brake Horse Power (HP)	
™ 0.5	, r		-0.4 3	
+ 1			\	
0 -	- 		 `-	
Ö	500		000 2500	
		Volume (CFM)		
Supply Pressi	<u>ure Drop Summa</u>	<u>ry</u>	Supply Fan Conditions	
Externa	l Static Pressure:	1.00 in H2O	Fan Motor BHP:	0.72 BHP
	Cooling Coil:	0.13 in H2O	Operating RPM:	1760 RPM
	Filter:	0.06 in H2O	Minimum RPM:	1195 RPM
	Primary Heat:	0.12 in H2O		
	HGRH:	0.03 in H2O		
	ERV OA:	0.49 in H2O		
Tota Exhaust Fan	ERV OA: al Static Pressure: GKHM_355	0.49 in H2O 1.83 in H2O		
	al Static Pressure:		0.8	
2.2 2 2	al Static Pressure:		-	
2.2 2 2	al Static Pressure:		-	
2.2 2 2	al Static Pressure:		-	
2.2 2 2	al Static Pressure:		-	Selection RDM
2.2 2 2	al Static Pressure:		-	Selection RPM User Selection
2.2 2 2	al Static Pressure:		-	
2.2 2 1.8 (), (), (), (), (), (), (), (), (), (),	al Static Pressure:		-	User Selection
2.2 2 1.8 1.6 (J)	al Static Pressure:		- 0.7 Brake Horse Pow	User Selection
2.2 2 1.8 (J.) (J.) (J.) (J.) (J.) (J.) (J.) (J.)	al Static Pressure:		-	User Selection
2.2 2 1.8 (),(i) 1.4 1.2 1.2 1.8 1.2 1.2 1.3 0.8 1.2 1.4 1.4 1.2 1.4 1.4 1.2 1.4 1.4 1.4 1.4 1.4 1.4 1.4 1.4 1.4 1.4	Static Pressure: GKHM_355	1.83 in H2O	- 0.7 Brake Horse Power (HP)	User Selection
2.2 2 1.8 (J.) (J.) (J.) (J.) (J.) (J.) (J.) (J.)	Static Pressure: GKHM_355	1.83 in H2O	-	User Selection
2.2 2 1.8 (),(i) 1.4 1.2 1.2 1.8 1.2 1.2 1.3 0.8 1.2 1.4 1.4 1.2 1.4 1.4 1.2 1.4 1.4 1.4 1.4 1.4 1.4 1.4 1.4 1.4 1.4	Static Pressure: GKHM_355	1.83 in H2O	- 0.7 Brake Horse Power (HP)	User Selection
2.2 1.8 2.4 (OM/II) aunssaud 0.8 1.2 1.2 1.2 1.2 1.2 1.2 1.2 1.2 1.2 1.2	Static Pressure: GKHM_355	1.83 in H2O 1000 1500 2 Volume (CFM)	0.7 Brake Horse Power (HP) 0.4	User Selection BHP
2.2 2 1.8 2.1 1.6 1.2 1.2 1.2 1.2 1.2 1.2 1.2 1.2 1.2 1.2	Static Pressure: GKHM_355 GKHM_355	1.83 in H2O 1000 1500 2 Volume (CFM)	0.7 Brake Horse Power (HP) 0.5 oct (HP) 0.4 Exhaust Fan Conditions	User Selection BHP
2.2 2 1.8 () () () 1.4 1.2 1.3 1.4 1.4 1.2 1.4 1.5 1.6 1.6 1.7 1.6 1.7 1.6 1.7 1.6 1.7 1.6 1.7 1.6 1.7 1.6 1.7 1.6 1.6 1.7 1.6 1.6 1.6 1.6 1.6 1.6 1.6 1.6 1.6 1.6	GKHM_355 GKHM_355 GKHM_355 500 Ure Drop Summa Static Pressure:	1.83 in H2O 1000 1500 2 Volume (CFM) 1 in H2O	0.7 Brake Horse Power (HP) 0.5 or (HP) 0.4 Exhaust Fan Conditions Fan Motor BHP:	User Selection BHP 0.71 BHP
2.2 2 1.8 2.1 1.6 2.1 2.2 2 1.8 2.2 2 2 2 2 3.8	GKHM_355 GKHM_355 GKHM_355 500 Ure Drop Summa Static Pressure: Return Filter PD:	1.83 in H2O 1000 1500 2 Volume (CFM) 1 in H2O 0.2 in H2O	0.7 Brake Horse Power (HP) 0.5 oct (HP) 0.4 Exhaust Fan Conditions	User Selection BHP
2.2 2 1.8 2.1 1.6 2.1 1.4 2.1 2.2 2 2 2 2 2 2 2 2 3.8	GKHM_355 GKHM_355 GKHM_355 500 Ure Drop Summa Static Pressure:	1.83 in H2O 1000 1500 2 Volume (CFM) 1 in H2O	0.7 Brake Horse Power (HP) 0.5 or (HP) 0.4 Exhaust Fan Conditions Fan Motor BHP:	User Selection BHP 0.71 BHP

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

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Charles (County Animal Shel	ter						September 13
Unit Elect	<u>rical Data</u>							
	Unit Voltage-Ph-Hz:	208-	-3-60		Min	Circuit Amp	pacity - MCA:	38 Amps
	Unit Amps - FLA:		31.9 Amps		Max	dimum Fuse	Size - MFS:	50 Amps
Electrical	<u>Summary</u>							
Component	Fan Serv	<u>rice</u>	Qty	<u>HP (ea.)</u>	FLA (ea.)	RLA (ea	.) <u>LRA (ea.)</u>	
ERV/HRV			1	0.07	0.38			
	Exhaust		1	2.5	4.4			
Digital Scrol	I		1			16.	.1 110	
	Supply		1	2.5	4.4			
	Condens	ser	1	1	4.2			
Controls			1		2.4			
Standard	Radiated Sound P	ower Le	evel (dBA)				
<u>63</u>	<u>125</u> <u>250</u>	<u>500</u>	<u>1000</u>	2000	<u>4000</u>	8000	Total dBA	
50.4	75.1 84.6	87.3	86.5	83	76.5	68.5	91.9	
Sound powe	er levels are listed for i	nformatio	nal purpose	es only and a	re not guara	nteed.		
Notes								
	option list schedule for	selected o	ntione					
	catalog for dimension a		•					
	Electrical amps include	•		ssor or electri	cal heat amns	•		
	's electrical as shown at	_	•					

ANIMAL SYSTEM 2

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

Exhaust Fan - GKHM_355 Unit Amps - FLA: 31.9 Amps

Min Circuit Ampacity - MCA: 38 Amps Maximum Fuse Size - MFS: 50 Amps

Charles County Animal Shelter September 13, 2019 Product Data - Horizon™ - Outdoor Air Unit (K/N)

Description Model Number N420 1 Horizon™ - Outdoor Air Unit (K/N) OAND420D3-D1C100LR-A1M00AG7JT1F53B0B0C0 Tag(s): AS-2

Unit Voltage: 208-3-60 Airflow Configuration: Horizontal Discharge/Horizontal Return Installation: Outdoor Evaporator Coil: DX 6 Row Interlaced Hot Gas Reheat: Modulating Compressor: Digital Scroll Both Circuits Condenser: Air Cooled Indoor Blower Motor: Direct Drive w/VFD Heat Type: Indirect Fired (IF) Fuel Type: Natural Gas 439 Stainless Steel Furnace: 600 Mbtu/h, (20:1 Turndown NG, 16:1 Turndown LP) Unit Controls: Trane UC600 - Space Control w/BACNET w/Display Powered Exhaust: Direct Drive w/VFD & Isolation Dampers ERV/HRV: ERV - Aluminum Construction w/ Frost Protection w/ VFD Energy Recovery & Conservation: ERC-5856A Damper Options: 2-Position Outdoor Air Damper - Class 1A Filters: MERV-8 Electrical Options: Non-Fused Disconnect Switch w/115v Outlet Accessories: Condenser Hailguard + LED Service Light Warranty: 1-Year Parts Only (manufacturer warranty) Supply Discharge Air Sensor (FLD) 2 inch Double Wall Construction Stainless Steel Drip Pan Blower HP - 7.5 Blower RPM - 2301 Supply Fan - CF180x2 Exhaust RPM - 2183 Exhaust HP - 10 Exhaust Fan - CF200 Unit Amps - FLA: 185.4 Amps Min Circuit Ampacity - MCA: 193.9 Amps Maximum Fuse Size - MFS: 225 Amps

<u>Tag:</u>	Con	nments:					
nit Information							
Model: H	orizon™ (OAK/N	Unit Length:	302 in	Weight O	perating:	8	3773 lb*
Size:	Rev5) N420	Unit Width:	101 in				nclude CURB weight. tal for actual
Quantity:	1	Unit Height:	93 in	Refrigerant	Charge		
Supply Airflow:	9,005 CFM	Elevation:	0 ft	Circuit 1:	•	lbs	
Outside Airflow:	9,005 CFM	Ambient Air DB:	95 F	Circuit 2:	43,44		
Minimum Airflow:	4,424 CFM			SHOULE.	10.11		
ooling Performance							
Gross Total Ca	pacity: 4	409.5 MBh		Evaporator Fa	.ce Area:	2	22.9 sq ft
Gross Sensible Ca	pacity: 2	264.3 MBh		Evaporator Ro	ws / FPI:	6 /	12
Net Total Ca	pacity: 3	385.4 MBh		Condenser Fa	ce Area:	4	49.9 sq ft
Net Sensible Ca	pacity: 2	240.2 MBh		Condenser Rov	vs / FPI :	3 /	12
Entering Air DB / WB	(Coil): 81.7 / 69	9.4 F		Air	Velocity:		393 fpm
Leaving Air DB / WB	(Coil): 55.2 / 55	5.2 F		Coi	il Air PD:	(0.36 in H2O
Leaving Air DB / WB (Re	•				EER:		15.3
Leaving Air DB / WB	(Unit): 67.9 / 6 6	0.1 F			Watts:		5546
	MRC: 26	63.89 lb/h			MRE:	į	5.79 lb/kWh
	Gas Furnace		Entering Ai		46.6 F		
Input Capacity Output Capacity:	600 MBh 480 MBh		Entering Ai Leaving Ai Coil Ai	ir DB: ir PD:	96 F 1.40 in H		
Input Capacity	600 MBh 480 MBh	<u> </u>	Leaving Ai	ir DB: ir PD:	96 F 1.40 in H		A Intake to this value
Input Capacity Output Capacity: nergy Recovery Whee Summer	600 MBh 480 MBh el ERC-5856A Conditions		Leaving Ai	ir DB: ir PD: ** <i>TAB Outside &</i> Winte	96 F 1.40 in H	ugh OA ons	
Input Capacity Output Capacity: nergy Recovery Whee	600 MBh 480 MBh ERC-5856		Leaving Ai	ir DB: ir PD: ** <i>TAB Outside a</i>	96 F 1.40 in H	ugh OA ons	A Intake to this value
Input Capacity Output Capacity: nergy Recovery Whee Summer	600 MBh 480 MBh el ERC-5856A Conditions Outsi		Leaving Ai	ir DB: ir PD: ** <i>TAB Outside &</i> Winte	96 F 1.40 in H airflow thro	ugh OA ons	
Input Capacity Output Capacity: nergy Recovery Whee Summer Ventilation Supply	600 MBh 480 MBh El ERC-5856A Conditions Outsi Airflow: 9, DB: 9	ide	Leaving Ai Coil Ai Ventile Airflow: DB:	ir DB: ir PD: ** TAB Outside & Winter ation Supply	96 F 1.40 in H airflow thro	ugh OA ons irflow: DB:	Dutside
Input Capacity Output Capacity: nergy Recovery Whee Summer Ventilation Supply Airflow: 9,005 CFM DB: 81.7 F WB: 69.4 F	600 MBh 480 MBh El ERC-5856A Conditions Outsi Airflow: 9, DB: 9	ide 142 CFM**	Leaving Ai Coil Ai Ventile Airflow: DB: WB:	ir DB: ir PD: ** TAB Outside & Winter ation Supply 9,005 CFM 46.6 F 42.3 F	96 F 1.40 in H airflow thro	ugh OA ons irflow:	9,142 CFM**
Input Capacity Output Capacity: nergy Recovery Whee Summer Ventilation Supply Airflow: 9,005 CFM DB: 81.7 F WB: 69.4 F PD: 1.06 in H20	600 MBh 480 MBh El ERC-5856A Conditions Outsi Airflow: 9, DB: 9 WB: 7	ide 142 CFM** 95.0 F	Leaving Ai Coil Ai Ventile Airflow: DB:	ir DB: ir PD: ** TAB Outside & Winter ation Supply 9,005 CFM 46.6 F	96 F 1.40 in H airflow thro r Condition	ugh OA ons irflow: DB:	9,142 CFM** 0.0 F
Input Capacity Output Capacity: nergy Recovery Whee Summer Ventilation Supply Airflow: 9,005 CFM DB: 81.7 F WB: 69.4 F PD: 1.06 in H20	600 MBh 480 MBh El ERC-5856A Conditions Outsi Airflow: 9, DB: 9	142 CFM** 95.0 F	Leaving Ai Coil Ai Ventile Airflow: DB: WB: PD:	ir DB: ir PD: ** TAB Outside & Winter ation Supply 9,005 CFM 46.6 F 42.3 F	96 F 1.40 in H airflow thro	ons O irflow: DB: WB:	9,142 CFM** 0.0 F
Input Capacity Output Capacity: nergy Recovery Whee Summer Ventilation Supply Airflow: 9,005 CFM DB: 81.7 F WB: 69.4 F PD: 1.06 in H20	600 MBh 480 MBh El ERC-5856A Conditions Outsi Airflow: 9, DB: 9 WB: 7	142 CFM** 95.0 F	Leaving Ai Coil Ai Ventile Airflow: DB: WB: PD:	ir DB: ir PD: ** TAB Outside a Winter ation Supply 9,005 CFM 46.6 F 42.3 F 0.94 in H20	96 F 1.40 in H airflow thro r Condition A	ons Ons irflow: DB: WB:	9,142 CFM** 0.0 F 0.0 F
Input Capacity Output Capacity: nergy Recovery Whee Summer Ventilation Supply Airflow: 9,005 CFM DB: 81.7 F WB: 69.4 F PD: 1.06 in H20 Return	600 MBh 480 MBh El ERC-5856A Conditions Outsi Airflow: 9, DB: 9 WB: 7	ide 142 CFM** 95.0 F 78.0 F	Ventila Airflow: DB: WB:	ir DB: ir PD: ** TAB Outside & Winter ation Supply 9,005 CFM 46.6 F 42.3 F 0.94 in H20	96 F 1.40 in H airflow thro r Condition A	ons iiflow: DB: WB:	9,142 CFM** 0.0 F 0.0 F
Input Capacity Output Capacity: Percentage Recovery Whee Summer Ventilation Supply Airflow: 9,005 CFM DB: 81.7 F WB: 69.4 F PD: 1.06 in H20 Return Airflow: 9,005 CFM	600 MBh 480 MBh El ERC-5856A Conditions Outsi Airflow: 9, DB: 9 WB: 7 R Exhau Airflow: 9, DB: 8	ide 142 CFM** 95.0 F 78.0 F	Leaving Ai Coil Ai Ventili Airflow: DB: WB: PD:	ir DB: ir PD: ** TAB Outside & Winter ation Supply 9,005 CFM 46.6 F 42.3 F 0.94 in H20 Return 9,005 CFM	96 F 1.40 in H airflow thro r Condition A	ons irflow: DB: WB:	9,142 CFM** 0.0 F 0.0 F **Exhaust* 9,142 CFM
Input Capacity Output Capacity: mergy Recovery Whee Summer Ventilation Supply Airflow: 9,005 CFM DB: 81.7 F WB: 69.4 F PD: 1.06 in H20 Return Airflow: 9,005 CFM DB: 75.0 F	600 MBh 480 MBh El ERC-5856A Conditions Airflow: 9, DB: \$ WB: 7 Exhau Airflow: 9, DB: \$ WB: 7	ide 142 CFM** 95.0 F 78.0 F ust 142 CFM 88.3 F	Leaving Ai Coil Ai Ventile Airflow: PD: Airflow: DB:	ir DB: ir PD: ** TAB Outside & Winter ation Supply 9,005 CFM 46.6 F 42.3 F 0.94 in H20 Return 9,005 CFM 70.0 F	96 F 1.40 in H airflow thro r Conditi	ugh OA ons irflow: DB: WB:	9,142 CFM** 0.0 F 0.0 F Exhaust 9,142 CFM 23.4 F
Input Capacity Output Capacity: nergy Recovery Whee Summer Ventilation Supply Airflow: 9,005 CFM DB: 81.7 F WB: 69.4 F PD: 1.06 in H20 Return Airflow: 9,005 CFM DB: 75.0 F WB: 63.0 F	600 MBh 480 MBh El ERC-5856A Conditions Airflow: 9, DB: \$ WB: 7 Exhau Airflow: 9, DB: \$ WB: 7	ide 142 CFM** 95.0 F 78.0 F ust 142 CFM 88.3 F 72.8 F	Leaving Air Coil Air	### TAB Outside a #### TAB Outside a #### TAB Outside a #### TAB Outside a ####################################	96 F 1.40 in H 1	ugh OA ons Liirflow: WB: Liirflow: DB: WB: WB:	9,142 CFM** 0.0 F 0.0 F 5.xhaust 9,142 CFM 23.4 F 23.4 F
Input Capacity Output Capacity: nergy Recovery Whee Summer Ventilation Supply Airflow: 9,005 CFM DB: 81.7 F WB: 69.4 F PD: 1.06 in H20 Return Airflow: 9,005 CFM DB: 75.0 F WB: 63.0 F	600 MBh 480 MBh El ERC-5856A Conditions Airflow: 9,	ide 142 CFM** 95.0 F 78.0 F ust 142 CFM 88.3 F 72.8 F	Leaving Air Coil Air Coil Air Surface Co	ir DB: ir PD: ** TAB Outside & Winter ation Supply 9,005 CFM 46.6 F 42.3 F 0.94 in H20 Return 9,005 CFM 70.0 F 58.0 F 1.00 in H20	96 F 1.40 in H airflow thro r Condition A E R A E air frost at	ugh OA ons Liirflow: WB: Liirflow: DB: WB: WB:	9,142 CFM** 0.0 F 0.0 F Exhaust 9,142 CFM 23.4 F 23.4 F 0.98 in H20
Input Capacity Output Capacity: nergy Recovery Whee Summer Ventilation Supply Airflow: 9,005 CFM DB: 81.7 F WB: 69.4 F PD: 1.06 in H20 Return Airflow: 9,005 CFM DB: 75.0 F WB: 63.0 F ESP: 1.00 in H20	600 MBh 480 MBh El ERC-5856A Conditions Airflow: 9, DB: 9 WB: 7 R Airflow: 9, DB: 8 WB: 7 Exhau Airflow: 9, DB: 8 WB: 7	ide 142 CFM** 95.0 F 78.0 F ust 142 CFM 88.3 F 72.8 F	Leaving Air Coil Air Coil Air New Coil Air N	ir DB: ir PD: ** TAB Outside a Winter ation Supply 9,005 CFM 46.6 F 42.3 F 0.94 in H20 Return 9,005 CFM 70.0 F 58.0 F 1.00 in H20 rgy Wheel will be stal Capacity: 62	96 F 1.40 in H 2irflow thro r Condition A E R A E A E A E A E A A A A A A A A A	ugh OA ons irflow: DB: WB: Editflow: DB: WB: WB: WB: WPD:	9,142 CFM** 0.0 F 0.0 F Exhaust 9,142 CFM 23.4 F 23.4 F 0.98 in H20

<u>/ Fan</u> CF180x2			·
5 4 3 2 1		- 8.8 g	Selection RPM Jser Selection BHP
6000 7000 8000 9000 10		000 15000 16000	
	Volume (CFM)	Supply Fan Conditions	
6000 7000 8000 9000 10	Volume (CFM)		9.45 BHP
6000 7000 8000 9000 10	Volume (CFM)	Supply Fan Conditions	9.45 BHP 2301 RPM
6000 7000 8000 9000 10 Ty Pressure Drop Summar External Static Pressure:	Volume (CFM) Y 1.50 in H2O	Supply Fan Conditions Fan Motor BHP:	
y Pressure Drop Summar External Static Pressure: Cabinet:	Y. 1.50 in H2O 0.01 in H2O	Supply Fan Conditions Fan Motor BHP: Operating RPM:	2301 RPM
ly Pressure Drop Summar External Static Pressure: Cabinet: Cooling Coil:	Y 1.50 in H2O 0.01 in H2O 0.36 in H2O	Supply Fan Conditions Fan Motor BHP: Operating RPM:	2301 RPM
ly Pressure Drop Summar External Static Pressure: Cabinet: Cooling Coil: Base Filter:	Y. 1.50 in H2O 0.01 in H2O 0.36 in H2O 0.01 in H2O	Supply Fan Conditions Fan Motor BHP: Operating RPM:	2301 RPM
y Pressure Drop Summar External Static Pressure: Cabinet: Cooling Coil: Base Filter: Filter:	Volume (CFM) 1.50 in H2O 0.01 in H2O 0.01 in H2O 0.01 in H2O 0.2 in H2O	Supply Fan Conditions Fan Motor BHP: Operating RPM:	2301 RPM
y Pressure Drop Summar External Static Pressure: Cabinet: Cooling Coil: Base Filter: Filter: Primary Heat:	Volume (CFM) 1.50 in H2O 0.01 in H2O 0.36 in H2O 0.01 in H2O 0.2 in H2O 1.4 in H2O	Supply Fan Conditions Fan Motor BHP: Operating RPM:	2301 RPM
y Pressure Drop Summar External Static Pressure: Cabinet: Cooling Coil: Base Filter: Filter: Primary Heat: HGRH:	Volume (CFM) 1.50 in H2O 0.01 in H2O 0.36 in H2O 0.01 in H2O 0.2 in H2O 1.4 in H2O 0.08 in H2O	Supply Fan Conditions Fan Motor BHP: Operating RPM:	2301 RPM

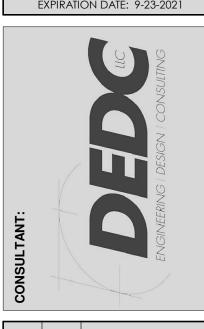
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		Inimal She	elter							September 13,
<u>Exhaust F</u>	- an	CF200								
6 -	_						7.8			
		\					ŀ			
5 -		1		- 1			7.6			
ઈ .	١,	1			1		7.4	ake (
£4-	/				1	 	7.2	Ä		
e. s. =					1		-	88	S	election RPM
Static Pressure (in.WC)	1				/ /		7.4 7.2 7 6.8	Pox	♠ U:	ser Selection
ig 2 =	l					\		e C	Bi	HP
	1					//	6.6	₫		
1 -						1	- 6.4			
0 -	<u> </u>					1	6.2			
	000 (6000	7000	8000	9000	10000	11000			
			Vo	lume (CFM)						
Exhaust f	Pressure	Drop Su	mmary			<u>Exh</u>	aust Fa	n Co	<u>onditions</u>	
Return E	xternal Stat	tic Pressure:		1 in H2C)		Fan Mo	tor Bh	HP:	7.22 BHP
	ERV Retu	ırn Filter PD:		0.3 in H2C)		Operati	ng RF	PM:	2183 RPM
	ER\	/ Wheel PD:		1.05 in H2C	<u> </u>					
Total E	Exhaust Sta	itic Pressure	;	2.35 in H2C)					
Unit Elect	trical Da	<u>ta</u>								
	Unit Vol	Itage-Ph-Hz:	208	-3-60		Min	Circuit An	pacity	y - MCA:	193.9 Amps
	Unit /	Amps - FLA:		185.4 Amps		Max	kimum Fus	se Size	e - MFS:	225 Amps
Electrical	Summa	ry								
		Fan Se	rvice	Qty	<u>HP (ea.)</u>	FLA (ea.)	RLA (e	a.)	LRA (ea.)	
Component							3	3.3	239	
Component	.11			1				3.3	239	
Component Digital Scro				1 1			3			
Component				1 1 1			3	34	240	
Component Digital Scro Digital Scro		Supply		1	7.5	19.8	3			
Component Digital Scro Digital Scro		Supply Condel		1 1	7.5 1	19.8 4.2	3			
Component Digital Scro Digital Scro				1 1 2			3			
Component Digital Scro Digital Scro Scroll				1 1 2 4		4.2	3			
Component Digital Scro Digital Scro Scroll Controls ERV/HRV	II	Conder Exhaus	nser	1 1 2 4 1 1	1 0.17 10	4.2 2.4	3			
Component Digital Scro Digital Scro Scroll Controls ERV/HRV	II	Conder Exhaus	nser	1 1 2 4 1	1 0.17 10	4.2 2.4 0.64	3			
Component Digital Scro Digital Scro Scroll Controls ERV/HRV	II	Conder Exhaus	nser	1 1 2 4 1 1	1 0.17 10	4.2 2.4 0.64	8000	34		
Component Digital Scro Digital Scro Scroll Controls ERV/HRV Standard	II Radiate	Conder Exhaus d Sound	nser st Power Le	1 1 2 4 1 1 1 evel (dBA)	0.17	4.2 2.4 0.64 25.4		<u>Tot</u>	240	
Component Digital Scro Digital Scro Scroll Controls ERV/HRV Standard 63 57.5	Radiate 125 80	Exhaus d Sound 250 82.3	nser Power Le 500 85.7	1 1 2 4 1 1 1 1 evel (dBA)	0.17 10 2000 87.5	4.2 2.4 0.64 25.4	8000 75.2	<u>Tot</u>	240 al dBA	
Component Digital Scro Digital Scro Scroll Controls ERV/HRV Standard 63 57.5 Sound power	Radiate 125 80	Exhaus d Sound 250 82.3	nser Power Le 500 85.7	1 1 2 4 1 1 1 1 evel (dBA)	0.17 10 2000 87.5	4.2 2.4 0.64 25.4 4000 83.6	8000 75.2	<u>Tot</u>	240 al dBA	
Component Digital Scro Digital Scro Scroll Controls ERV/HRV Standard 63 57.5 Sound powe	Radiater 125 80 er levels an	Exhaus d Sound 250 82.3 re listed for	nser Power Le 500 85.7 information	1 1 2 4 1 1 1 1 evel (dBA) 1000 87.3	0.17 10 2000 87.5	4.2 2.4 0.64 25.4 4000 83.6	8000 75.2	<u>Tot</u>	240 al dBA	
Component Digital Scro Digital Scro Scroll Controls ERV/HRV Standard 63 57.5 Sound powe Notes • See	Radiater 125 80 er levels al	Exhaus d Sound 250 82.3 re listed for	Power Lo 500 85.7 information	1 1 2 4 1 1 1 1 1 2 vel (dBA) 1000 87.3 snal purpose	0.17 10 2000 87.5	4.2 2.4 0.64 25.4 4000 83.6	8000 75.2	<u>Tot</u>	240 al dBA	
Component Digital Scro Digital Scro Scroll Controls ERV/HRV Standard 63 57.5 Sound powe Notes • See • See	Radiated 125 80 er levels all e option list e catalog fo	Exhaus d Sound 250 82.3 re listed for schedule for r dimension	Power Le 500 85.7 Information	1 1 2 4 1 1 1 1 1 2 4 7 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	1 0.17 10 2000 87.5 s only and a	4.2 2.4 0.64 25.4 4000 83.6 are not guara	8000 75.2 nteed.	<u>Tot</u>	240 al dBA	
Component Digital Scro Digital Scro Scroll Controls ERV/HRV Standard 63 57.5 Sound powe Notes • See • Uni	Radiate 125 80 er levels all e option list e catalog fo	Exhaus d Sound 250 82.3 re listed for schedule for r dimension amps include	Power Le 500 85.7 r information r selected of and weight the greater	1 1 2 4 1 1 1 1 1 2 4 7 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	1 0.17 10 2000 87.5 s only and a	4.2 2.4 0.64 25.4 4000 83.6	8000 75.2 nteed.	Tot	240 al dBA 93	tov

ARCHITECTURE + MASTER PLANNING 10839-D PHILADELPHIA RD WHITE MARSH, MD 21162 (P) 410-344-1460 (F) 443-403-2460 (E) INFO@MWSARCH.COM WWW.MWSARCH.COM

I HEREBY CERTIFY THAT THESE DOCUMENTS WERE PREPARED OR APPROVED BY ME, SCOTT A. FRENCK, PI AND THAT I AM A DULY LICENSED PROFESSIONAL ENGINEER UNDER THE LAWS OF THE STATE OF MARYLAND. LICENSE NUMBER: #47259 EXPIRATION DATE: 9-23-2021



CARE

PROJECT NUMBER: PROJECT SET: DATE ISSUED: 12/23/2019 DRAWING TITLE: AHU SCHEDULES -**ANIMAL SYSTEMS**

SHEET NUMBER:

NO. DESCRIPTION DATE

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

ANIMAL SYSTEM 3

Unit Voltage: 208-3-60

 Charles County Animal Shelter
 September 13, 2019

 Product Data - Horizon™ - Outdoor Air Unit (B/G)

 Size
 Qty
 Description
 Model Number

 B060
 1
 Horizon™ - Outdoor Air Unit (B/G)
 OABD060D3-C1B100AB-A1C00AG8AB1C10B3C4C0

 Tag(s): AS-3

Airflow Configuration: Horizontal Discharge/Horizontal Return Installation: Outdoor
Evaporator Coil: DX 4 Row Interlaced
Hot Gas Reheat: Modulating
Compressor: Digital Scroll Primary Circuit
Condenser: Air Cooled
Indoor Blower Motor: ECM w/ Backward Curved Plenum Fan
Heat Type: Indirect Fired (IF)
Fuel Type: Natural Gas
439 Stainless Steel Furnace: 100 Mbtu/h, (5:1 Turndown NG, 4:
Unit Controls: Trane UC600 - Space Control w/BACNET w/Displ.
Powered Exhaust: ECM w/ Backward Curved Plenum Fan w/Isol

439 Stainless Steel Furnace: 100 Mbtu/h, (5:1 Turndown NG, 4:1 Turndown LP) Unit Controls: Trane UC600 - Space Control w/BACNET w/Display Powered Exhaust: ECM w/ Backward Curved Plenum Fan w/Isolation Dampers ERV/HRV: ERV - Aluminum Construction w/ Bypass Dampers Energy Recovery & Conservation: ERC-3014A Damper Options: 2-Position Outdoor Air Damper Filters: MERV-8 Smoke Detectors: Supply & Return Electrical Options: Non-Fused Disconnect Switch w/ 115v Outlet (B/G) Air Flow Monitoring: IFM Piezo Ring and PE Piezo Ring/Tap Accessories: Condenser Hailguard + LED Service Light Warranty: 1-Year Parts Only (manufacturer warranty) Warranty: 5-Year Digital/Variable Speed Scroll Compressor Supply Discharge Air Sensor (FLD) 2 inch Double Wall Construction Stainless Steel Drip Pan Blower HP - 2.5 Blower RPM - 1927 Supply Fan - GKHM_355 Exhaust RPM - 1899 Exhaust HP - 2.5 Exhaust Fan - GKHM_355

<u>Tag:</u> AS-3	,		С	omments:									
Unit Inform	<u>mation</u>												
	Mode	l: Hor	izon™ (OAB/0	G Unit Ler	ngth:	161 in	Weight	Operat	ing:	1867 lb*			
	Size	e:	Rev5) B060	Unit W	idth:	52 in			/eight does not include CURB w ee CURB submittal for actual				
	Quantity		1	Unit He		55 in				ttai ioi ac	luai		
5	Supply Airflow	r:	1,336 CFM	Eleva	tion:	0 ft	Refrigerar		_				
О	Outside Airflow	<i>I</i> :	1,336 CFM	Ambient Air	DB:	95 F	Circuit 1:		14.9 lbs				
Min	nimum Airflow	<i>I</i> :	737 CFM										
Cooling P	erformanc	<u>е</u>											
	Gross Total	I Сара	.city:	61.7 MBh			Evaporator	Face Ar	ea:	4.17 sq t	ft		
G	ross Sensible	Capa	.city:	39.1 MBh			Evaporator F	Rows/F	PI: 4 /	12			
	Net Tota	l Capa	city:	59.2 MBh			Condenser	Face Ar	ea:	10.83 sq t	ft		
	Net Sensible	Capa	city:	36.6 MBh			Condenser R	ows/F	PI: 2 /	14			
Ente	ering Air DB /	WB (C	Coil): 80.1 /	67.8 F			Δ	ir Veloc	city:	320 fpm	1		
Lea	ving Air DB /	WB (C	Coil): 53.6 /	52.8 F			C	Coil Air F	PD:	0.18 in H	120		
Leaving	air DB / WB	(Rehe	eat): 83.41 /	64.09 F				El	ER:	19.1			
Leav	ving Air DB /	WB (U	Jnit): 85.5 /	64.8 F				Wa		5936			
		М	IRC:	40.77 lb/h				M	RE:	6.87 lb/k	Wh		
Heating P	erformanc												
_	Heat Type:		as Furnace		F	Entering Air	r DB·	52.2	F				
	ut Capacity	۵.	100 MBh			Leaving Air		107.6					
•	ut Capacity:		80 MBh			Coil Air			in H2O				
										24///			
Energy Re	ecovery W	<u>neel</u>	ERC-301	4A	-		** TAB Outside	е аптюч	r inrough C	JA Intake i	to this value		
		ner Co	onditions		L			ter Cor	nditions				
Ventilati	ion Supply		Out	tside		<u>Ventila</u>	tion Supply			<u>Outside</u>			
Airflow:	1,336 CFM		Airflow:	1,423 CFM**		Airflow:	1,336 CFM		Airflow	1,423	CFM**		
DB:	80.1 F		DB:	95.0 F		DB:	52.2 F		DB	0.0	F		
WB:	67.8 F	E	WB:	78.0 F		WB:	46.7 F	E	WB	: 0.0	F		
PD:	0.63 in H20	_ R				PD:	0.56 in H20	0 					
	eturn_		Ext	naust	_	<u>F</u>	<u>Return</u>			Exhaust			
Re		~	Í	4 400 0514		Airflow:	1,395 CFM	~	Airflow	: 1,482	CEM		
	1,395 CFM	•	Airflow:	1,482 CFM		AII IIOW.	1,000				CI IVI		
	1,395 CFM 75.0 F		Airflow: DB:	1,482 CFM 89.3 F		DB:	70.0 F		DB	,			
Airflow:	•			•			•			20.0	F		

Energy Wheel will be in frost at these design conditions

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Sensible Capacity: 80.19 MBH Eff: 0.75

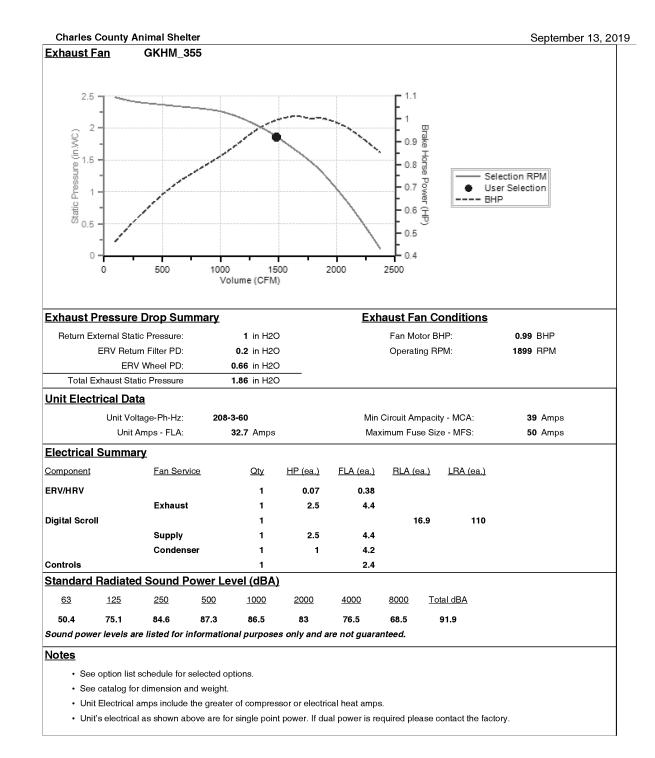
Latent Capacity: 25.17 MBH Eff: 0.7

Latent Capacity: 33.01 MBH Eff: 0.65

Page 16 of 56

Total Capaciy: 105.36 MBH

Charles County Animal Shelter September 13, 2019 Supply Fan GKHM_355 ---- Selection RPM User Selection ---- BHP Volume (CFM) **Supply Pressure Drop Summary** Supply Fan Conditions External Static Pressure: Fan Motor BHP: **0.99** BHP **1.00** in H2O Operating RPM: 1927 RPM **0.01** in H2O Cabinet: Cooling Coil: **0.18** in H2O Minimum RPM: 1179 RPM Base Filter: **0.01** in H2O **0.1** in H2O **0.13** in H2O Primary Heat: HGRH: **0.04** in H2O ERV OA: **0.63** in H2O **2.10** in H2O Total Static Pressure:



ANUMAL OVOTEM A

Unit Amps - FLA: 32.7 Amps Min Circuit Ampacity - MCA: 39 Amps

Maximum Fuse Size - MFS: 50 Amps

FLD = Furnished by Trane / Installed by Others

Trane Equipment Submittal

September 13, 2019

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

Total Capaciy: 53.91 MBH

Sensible Capacity: 22.91 MBH Eff. 0.75

Latent Capacity: 30.99 MBH Eff: 0.7

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

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ANIMAL SYSTEM 4

Unit Amps - FLA: 39.8 Amps

Min Circuit Ampacity - MCA: 47.8 Amps

Maximum Fuse Size - MFS: 60 Amps

Charles County Animal Shelter

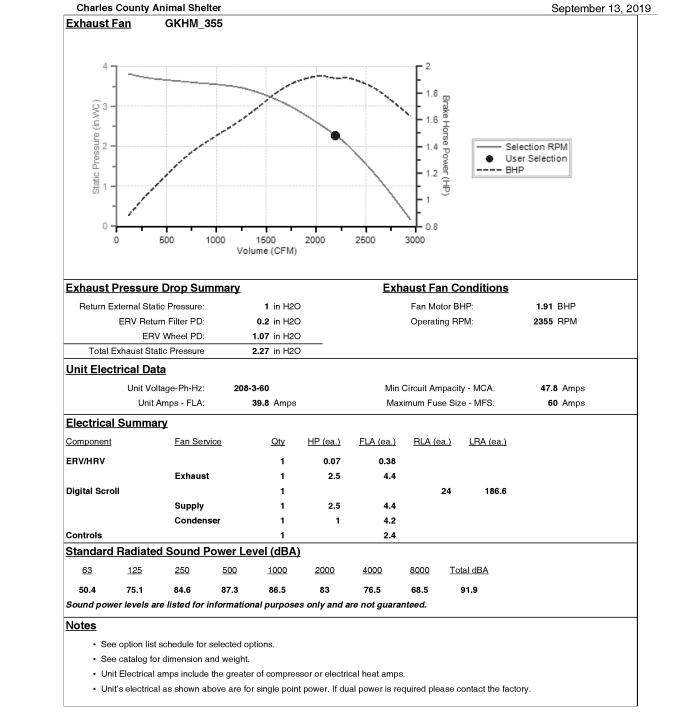
Product Data - Horizon™ - Outdoor Air Unit (B/G)

SizeQtyDescriptionModel NumberB0961Horizon™ - Outdoor Air Unit (B/G)OABD096A3-C1B100AB-A1D00AG8AB1C10B3C4C0Tag(s): AS-4

Unit Voltage: 208-3-60 Airflow Configuration: Vertical Discharge/Vertical Return Installation: Outdoor Evaporator Coil: DX 4 Row Interlaced Hot Gas Reheat: Modulating Compressor: Digital Scroll Primary Circuit Condenser: Air Cooled Indoor Blower Motor: ECM w/ Backward Curved Plenum Fan Heat Type: Indirect Fired (IF) Fuel Type: Natural Gas 439 Stainless Steel Furnace: 125 Mbtu/h, (5:1 Turndown NG, 4:1 Turndown LP) Unit Controls: Trane UC600 - Space Control w/BACNET w/Display Powered Exhaust: ECM w/ Backward Curved Plenum Fan w/Isolation Dampers ERV/HRV: ERV - Aluminum Construction w/ Bypass Dampers Energy Recovery & Conservation: ERC-3014A Damper Options: 2-Position Outdoor Air Damper Filters: MERV-8 Smoke Detectors: Supply & Return Electrical Options: Non-Fused Disconnect Switch w/ 115v Outlet (B/G) Air Flow Monitoring: IFM Piezo Ring and PE Piezo Ring/Tap Accessories: Condenser Hailguard + LED Service Light Warranty: 1-Year Parts Only (manufacturer warranty) Warranty: 5-Year Digital/Variable Speed Scroll Compressor Supply Discharge Air Sensor (FLD) 2 inch Double Wall Construction Stainless Steel Drip Pan Blower HP - 2.5 Blower RPM - 2242 Supply Fan - GKHM_355 Exhaust RPM - 2355 Exhaust HP - 2.5 Exhaust Fan - GKHM_355

<u>Гад:</u> AS-4		(Comments:					
nit Information								
Mod	lel: Hoi	rizon™ (OAB/ Rev5)	G Unit Length:	161 in	Weight	Operati	ing:	1907 lb*
Si	ze:	B096	Unit Width:	52 in				include CURB weig ttal for actual
Quant	ity:	1	Unit Height:	55 in	Refrigeran	t Char	10	
Supply Airflo	w:	1,819 CFM	Elevation:	0 ft	Circuit 1:		18.77 lbs	
Outside Airflo	ow:	1,819 CFM	Ambient Air DB:	95 F	Cilcuit 1.		10.77 IDS	
Minimum Airflo	w:	922 CFM						
ooling Performar	<u>ice</u>							
Gross To	tal Capa	acity:	89.3 MBh		Evaporator F	ace Ar	ea:	6.56 sq ft
Gross Sensib	le Capa	acity:	55.1 MBh		Evaporator R	ows / F	PI: 4 /	12
Net To	tal Capa	acity:	85.1 MBh		Condenser F	ace Ar	ea:	10.83 sq ft
Net Sensib	le Capa	acity:	50.9 MBh		Condenser Ro	ows/F	PI: 2/	14
Entering Air DB	/ WB (0	Coil): 80.6	/ 68.4 F		Ai	ir Veloc	ity:	277 fpm
Leaving Air DB	/ WB (0	Coil): 53.2 /	/ 52.5 F		С	oil Air F	PD:	0.15 in H2O
Leaving Air DB / W	/B (Reh	eat): 84.86 /	64.47 F			E	ER:	15.5
Leaving Air DB	/ WB (U	Jnit): 87.4 /	/ 65.3 F			Wa	tts:	9959
	ice	IRC:	62.06 lb/h	Enterina Ai	r DB:		RE:	6.23 lb/kWh
Heat Type: Input Capacity	ice			Entering Ai Leaving Ai Coil Ai	r DB:	50.2 101.1	F	6.23 lb/kWh
Heat Type: Input Capacity Output Capacity:	i ce G	as Furnace 125 MBh 100 MBh	ı	Leaving Ai Coil Ai	r DB: r PD:	50.2 101.1 0.17	F F in H2O	
Heat Type: Input Capacity Output Capacity: nergy Recovery \	ce G Wheel	as Furnace 125 MBh 100 MBh	ı	Leaving Ai Coil Ai	r DB: r PD: ** <i>TAB Outside</i>	50.2 101.1 0.17	F F in H2O	6.23 lb/kWh OA Intake to this valu
Heat Type: Input Capacity Output Capacity: nergy Recovery \	ce G Wheel	as Furnace 125 MBh 100 MBh ERC-301	ı	Leaving Ai	r DB: r PD: ** <i>TAB Outside</i>	50.2 101.1 0.17	F F in H2O through C	
Heat Type: Input Capacity: Output Capacity: nergy Recovery \ Sum	G Wheel	as Furnace 125 MBh 100 MBh ERC-301	14A	Leaving Ai	r DB: r PD: ** TAB Outside Wint	50.2 101.1 0.17	F F in H2O through C	DA Intake to this valu Outside
Heat Type: Input Capacity: Output Capacity: nergy Recovery \ Sum Ventilation Supply	G Wheel	as Furnace 125 MBh 100 MBh ERC-301 onditions	14A utside	Leaving Ai Coil Ai	r DB: r PD: ** TAB Outside Wint ation Supply	50.2 101.1 0.17	F F in H2O through C	OA Intake to this value Outside : 1,910 CFM**
Heat Type: Input Capacity: Output Capacity: nergy Recovery \ Sum Ventilation Supply Airflow: 1,819 CFM	G Wheel	as Furnace 125 MBh 100 MBh ERC-301 onditions Ou	14A <u>utside</u> 1,910 CFM**	Leaving Ai Coil Ai Ventila Airflow:	r DB: r PD: ** TAB Outside Wint ation Supply 1,819 CFM	50.2 101.1 0.17	F F in H2O through C aditions Airflow	Outside 1,910 CFM** 1,00 F
Input Capacity Output Capacity: nergy Recovery \(\) Sum Ventilation Supply Airflow: 1,819 CFM DB: 80.7 F	Wheel amer C	as Furnace 125 MBh 100 MBh ERC-301 onditions On Airflow: DB: WB:	14A utside 1,910 CFM** 95.0 F	Leaving Ai Coil Ai Ventila Airflow: DB:	r DB: r PD: ** TAB Outside Wint ation Supply 1,819 CFM 50.2 F	50.2 101.1 0.17 airflow er Cor	F F in H2O through C aditions Airflow DB	Outside 1,910 CFM** 1,00 F
Heat Type: Input Capacity: Output Capacity: Nergy Recovery V Sum Ventilation Supply Airflow: 1,819 CFM DB: 80.7 F WB: 68.5 F	Wheel	as Furnace 125 MBh 100 MBh ERC-301 onditions Out Airflow: DB: WB:	14A utside 1,910 CFM** 95.0 F	Leaving Ai Coil Ai Ventila Airflow: DB: WB: PD:	r DB: r PD: ** TAB Outside Wint ation Supply 1,819 CFM 50.2 F 45.1 F	50.2 101.1 0.17 o airflow er Cor	F F in H2O v through C nditions Airflow DB WB	Outside 1,910 CFM** 1,00 F
Heat Type: Input Capacity: Output Capacity: Nergy Recovery \ Sum Ventilation Supply Airflow: 1,819 CFM DB: 80.7 F WB: 68.5 F PD: 0.93 in H2	Wheel	as Furnace 125 MBh 100 MBh ERC-301 onditions Out Airflow: DB: WB:	14A utside 1,910 CFM** 95.0 F 78.0 F	Leaving Ai Coil Ai Ventila Airflow: DB: WB: PD:	r DB: r PD: ** TAB Outside Wint ation Supply 1,819 CFM 50.2 F 45.1 F 0.83 in H20	50.2 101.1 0.17 airflow er Cor	F F in H2O v through C nditions Airflow DB WB	Outside : 1,910 CFM** : 0.0 F : 0.0 F
Heat Type: Input Capacity: Output Capacity: Nergy Recovery V Sum Ventilation Supply Airflow: 1,819 CFM DB: 80.7 F WB: 68.5 F PD: 0.93 in Ha	Wheel	as Furnace 125 MBh 100 MBh ERC-301 onditions On Airflow: DB: WB:	14A utside 1,910 CFM** 95.0 F 78.0 F	Leaving Ai Coil Ai Ventile Airflow: DB: WB: PD:	r DB: r PD: ** TAB Outside Wint ation Supply 1,819 CFM 50.2 F 45.1 F 0.83 in H20	50.2 101.1 0.17 airflow er Cor	F F in H2O through C aditions Airflow DB WB	Outside : 1,910 CFM** : 0.0 F : 0.0 F Exhaust : 2,191 CFM
Heat Type: Input Capacity: Output Capacity: Nergy Recovery V Sum Ventilation Supply Airflow: 1,819 CFM DB: 80.7 F WB: 68.5 F PD: 0.93 in H2 Return Airflow: 2,100 CFM	Wheel	as Furnace 125 MBh 100 MBh ERC-301 onditions On Airflow: DB: WB:	14A utside 1,910 CFM** 95.0 F 78.0 F thaust 2,191 CFM	Leaving Ai Coil Ai Ventila Airflow: DB: WB: PD:	r DB: r PD: ** TAB Outside Wint ation Supply 1,819 CFM 50.2 F 45.1 F 0.83 in H20 Return 2,100 CFM	50.2 101.1 0.17 airflow er Cor	F F in H2O through C aditions Airflow DB WB	Outside : 1,910 CFM** : 0.0 F : 0.0 F Exhaust : 2,191 CFM : 26.5 F
Heat Type: Input Capacity: Output Capacity: Mergy Recovery \(\) Sum Ventilation Supply Airflow: 1,819 CFM DB: 80.7 F WB: 68.5 F PD: 0.93 in H2 Return Airflow: 2,100 CFM DB: 75.0 F	Wheel Immer C	as Furnace 125 MBh 100 MBh ERC-301 onditions DB: WB: Airflow: DB: DB:	14A utside 1,910 CFM** 95.0 F 78.0 F chaust 2,191 CFM 87.4 F	Leaving Ai Coil Ai Ventila Airflow: PD: Airflow: DB:	r DB: r PD: ** TAB Outside Wint ation Supply 1,819 CFM 50.2 F 45.1 F 0.83 in H20 Return 2,100 CFM 70.0 F	50.2 101.1 0.17 a airflow	F F in H2O through C nditions Airflow DB Airflow DB	Outside : 1,910 CFM** : 0.0 F : 0.0 F Exhaust : 2,191 CFM : 26.5 F : 26.5 F
Heat Type: Input Capacity: Output Capacity: Mergy Recovery \(\) Ventilation Supply Airflow: 1,819 CFM DB: 80.7 F WB: 68.5 F PD: 0.93 in H2 Return Airflow: 2,100 CFM DB: 75.0 F WB: 63.0 F	Wheel Immer C	as Furnace 125 MBh 100 MBh ERC-301 onditions DB: WB: Airflow: DB: WB:	14A 1,910 CFM** 95.0 F 78.0 F thaust 2,191 CFM 87.4 F 72.4 F	Leaving Air Coil Air Coil Air Ventila Airflow: DB: WB: PD: Airflow: DB: WB: ESP:	r DB: r PD: ** TAB Outside Wint ation Supply 1,819 CFM 50.2 F 45.1 F 0.83 in H20 Return 2,100 CFM 70.0 F 58.0 F 1.00 in H20	50.2 101.1 0.17 a airflow	F F in H2O through C ditions Airflow DB WB Airflow BWB	Outside : 1,910 CFM** : 0.0 F : 0.0 F Exhaust : 2,191 CFM : 26.5 F : 26.5 F

ı <u>pply Fan</u> GKHM_355			
0 500 1000	1500 2000 Volume (CFM)	L ₁₁ § •	Selection RPM User Selection BHP
	volume (or m)		
upply Pressure Drop Summa		Supply Fan Conditions	<u>.</u>
upply Pressure Drop Summal External Static Pressure:		Supply Fan Conditions Fan Motor BHP:	1.64 BHP
	r <u>y</u>		
External Static Pressure:	TY 1.00 in H2O	Fan Motor BHP:	1.64 BHP
External Static Pressure: Cabinet:	1.00 in H2O 0.01 in H2O	Fan Motor BHP: Operating RPM:	1.64 BHP 2242 RPM
External Static Pressure: Cabinet: Cooling Coil:	1.00 in H2O 0.01 in H2O 0.15 in H2O	Fan Motor BHP: Operating RPM:	1.64 BHP 2242 RPM
External Static Pressure: Cabinet: Cooling Coil: Base Filter:	1.00 in H2O 0.01 in H2O 0.15 in H2O 0.01 in H2O	Fan Motor BHP: Operating RPM:	1.64 BHP 2242 RPM
External Static Pressure: Cabinet: Cooling Coil: Base Filter: Filter:	1.00 in H2O 0.01 in H2O 0.15 in H2O 0.01 in H2O 0.01 in H2O 0.18 in H2O	Fan Motor BHP: Operating RPM:	1.64 BHP 2242 RPM
Cabinet: Cooling Coil: Base Filter: Filter: Primary Heat:	1.00 in H2O 0.01 in H2O 0.15 in H2O 0.01 in H2O 0.01 in H2O 0.18 in H2O 0.17 in H2O	Fan Motor BHP: Operating RPM:	1.64 BHP 2242 RPM



FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal Page 5 of 56 FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

Latent Capacity: 39.35 MBH Eff: 0.65

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

Page 17 of 56

FLD = Furnished by Trane / Installed by Others Trane Equipment Submittal

LES COUNTY
LES COUNTY ANIMAL CARE CENTE
NINEY CHURCH ROAD

ARCHITECTURE + MASTER PLANNING

10839-D PHILADELPHIA RD WHITE MARSH, MD 21162

(E) INFO@MWSARCH.COM

I HEREBY CERTIFY THAT THESE

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APPROVED BY ME, SCOTT A. FRENCK, PE

AND THAT I AM A DULY LICENSED

PROFESSIONAL ENGINEER UNDER THE

LAWS OF THE STATE OF MARYLAND.

LICENSE NUMBER: #47259 EXPIRATION DATE: 9-23-2021

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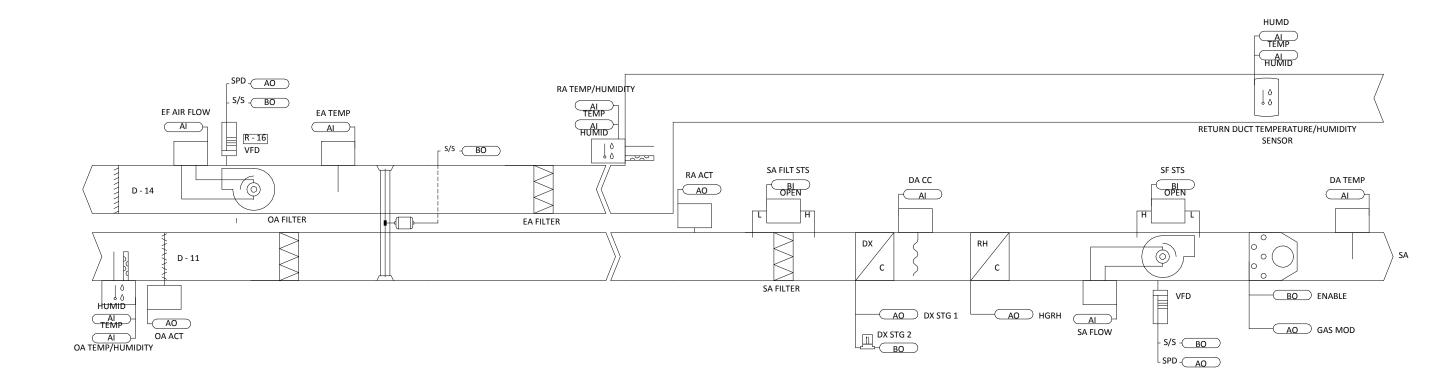
NO. DESCRIPTION DATE

PROJECT NUMBER: 18-034
PROJECT SET: PERMIT
DATE ISSUED:

DRAWING TITLE:
AHU SCHEDULES ANIMAL SYSTEMS

SHEET NUMBER: M605

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Operation During Occupied Space control units shall be shipped loose with a duct mounted temp/humidity combo sensor to be installed in the return ductwork. Space conditions can also be communicated via a BAS system.

When the contacts at Terminal OAUTS 9 and 10 are open, the unit's operation will be in Alarm Status. Unit will begin normal operation upon closure of OAUTS 9 and 10. **Important:** Cycling power to unit to clear alarm may not resolve alarm condition. Starting Sequence

When 3-phase is powered to the unit the main unit controller and the RTRM will initialize. Initialization process requires approximately 3 minutes. The unit is placed in occupied operation via either the BAS or by closing connection between unit terminals OAUTS 7 and 8. The unit must not be in lockout. No Return Air Damper Installed

The outdoor air damper will be commanded to open. The damper end switch will make causing the main unit controller to initialize the indoor fan starting sequence. If the unit is equipped with a VFD on the indoor fan(s) the sequence will begin by sending a preset run signal (field adjustable between 50 percent and 100 percent). If the unit is equipped with an ECM fan the sequence will begin by controlling to a field adjustable CFM setpoint. If after 30 seconds the indoor fan proving switch does not prove the indoor fan on, the main unit controller will command the indoor fan off and signal an

With Return Air Damper Installed

MANNS WOODWARD STUDIOS.

Emergency Stop

Identical to sequence with no return air damper except the outdoor air and return air dampers will be commanded to move to their preset occupied positions. For units equipped with Modulating Dampers this is the Minimum OA Damper Position, unless other Economizer or Ventilation demand a higher volume of outdoor air. Outdoor air damper end switch is disabled when the return air damper is installed.

Free Cooling Mode is enabled when the Outdoor Air Temperature is cooler than five degrees below the Discharge Air Cooling Setpoint Active and the unit is in Economizer Mode. During Free Cooling Mode mechanical cooling is locked out and the dampers will modulate to maintain the Discharge Air Cooling Setpoint.

Ventilation mode is enabled base on space temperature and outdoor air temperature. Operation in Ventilation Mode is enabled when the space temperature is between the

Occupied Cooling Setpoint and the Occupied Heating Setpoint, and the outdoor temperature is between the Outdoor Air Cooling Setpoint and the Outdoor Air Heating Setpoint. Operation in Ventilation Mode continues until conditions call for dehumidification or when the space and outdoor air temperature fall outside of those

During Ventilation Mode both cooling and heat will be locked out and the outdoor air damper will remain at the Minimum OA Damper Position Heating Mode is enabled based on Outdoor Air Heating Setpoint (OAHS), Occupied

Heating Setpoint, and Occupied Cooling Setpoint. If the outdoor air temperature is lower than the OAHS then Heating Mode shall be enabled. If the outdoor air temperature is above the OAHS but the unit is not calling for cooling or dehumidification then the unit shall switch between Heating and Cooling Mode as necessary to maintain an average temperature of the Occupied Cooling Setpoint and the Occupied Heating Setpoint. The Discharge Air Temperature Setpoint Active is reset based on the Space Temperature Active and the Occupied Heating Setpoint. In the event of an ignition failure on indirect fired gas heat, the main unit controller will retry to ignite the gas heater three times before locking out the heater. Units with hot water heat selected will have a normally open water valve shipped loose. The binary enable and the control signal are factory installed. Wiring between the unit controls and the valve is field installed. The valve is enabled and forced closed

whenever the fan is running and heating is not required. Non-heat Pump Heating (Auxiliary Heating) During Heating Mode the main unit controller will modulate the heating output to maintain the Discharge Air Setpoint Active. Maximum discharge air heating temperature is adjustable but cannot exceed 120°F for gas or hot water heat and 90°F Discharge Air Temperature Setpoint Active. for electric heat. Hot gas reheat is disabled when heating is enabled.

Dehumidification Mode is enabled on Outdoor Air Dewpoint Setpoint (OADS) or Space Dewpoint Setpoint (SPDS). If there is no call for Heating Mode and the outdoor air dewpoint is above or equal to the OADS or the space dewpoint is above or equal to the SPDS then Dehumidification Mode shall be enabled. Dehumidification Mode will remain active until the space or outdoor air dewpoints fall below the setpoints by 2 degrees, or if Heating Mode is enabled. Space Dewpoint Setpoint (SPDS) is calculated based on the Occupied Cooling Setpoint and the Space Humidity Setpoint. The

minimum allowable value is 45°F. Units Equipped with Direct Expansion Cooling Compressor control is based on Evaporator Leaving Air Temperature Setpoint. With dehumidification enabled, if evaporator leaving air temperature is above setpoint first stage dehumidification (Compressor 1) will start. Compressor staging is similar to Heating Mode. During operation in Dehumidification Mode, the main unit controller will enable hot gas reheat and it will modulate to maintain the Occupied Cooling Setpoint.

Hot Gas Reheat Purge Following continuous 30-minute hot gas reheat operation at less than 100 percent reheat capacity a purge cycle will be initiated. During the purge cycle, the hot gas reheat signal is set and held at 100 percent for a period of 3 minutes. Following the purge cycle, normal operation resumes. Cooling Mode

Cooling Mode is enabled based on Outdoor Air Cooling Setpoint (OACS), Occupied Heating Setpoint, and Occupied Cooling Setpoint. If the outdoor air temperature is above the OACS then Cooling Mode shall be enabled. If the outdoor air temperature is below the OACS but the unit is not calling for heating or dehumidification then the unit shall switch between Heating and Cooling Mode as necessary to maintain an average temperature of the Occupied Cooling Setpoint and the Occupied Heating Setpoint. The Discharge Air Temperature Setpoint Active is reset based on the Space Temperature Active and the Occupied Heating Setpoint. Units Equipped with Direct Expansion Cooling

Compressor staging is identical to dehumidification however the control temperature is the Discharge Air Temperature Setpoint Active. Should the discharge temperature begin to fall too low, the hot gas reheat shall be enabled and modulate to maintain the

Occupied Heating Mode.

Space temperature/humidity sensor must be installed or the space conditions Emergency Stop

When the contacts at Terminal OAUTS 9 and 10 are open, the unit's operation will be **Discharge Control** in Alarm Status. Unit will begin normal operation upon closure of OAUTS 9 and 10. Important: Cycling power to unit to clear alarm may not resolve alarm condition. Unoccupied starting sequence begins when the Unoccupied Heating, Cooling, or Dehumidification Mode is enabled. Otherwise, the unit shall remain dormant with the **Exhaust Fan Operation**

indoor fan disabled. Indoor fan proving sequence is identical to occupied operation. With Return Air Damper Installed The outdoor air damper will be commanded to close and the return air damper will open. Outdoor air damper end switch is disabled when the return air damper is section the outdoor air damper shall open to maximum position. No Return Air Damper Installed

Identical to occupied sequence no return air damper installed. Unoccupied Heating Mode Unoccupied Heating Mode is enabled when the Space Temperature falls below the Unoccupied Heating Setpoint - 1. Unoccupied Heating Mode will continue until the

Unoccupied Dehumidification Mode When no call for Unoccupied Heating Unoccupied Dehumidification Mode is enabled when the Space Dewpoint rises above the Unoccupied Dewpoint Setpoint + 1. Unoccupied Dehumidification Mode shall be disabled when the Space Dewpoint falls below the Unoccupied Dewpoint Setpoint - 1. During Unoccupied Dehumidification the modulate to 100 percent open and the exhaust temp across the ERV drops below 10° cooling is driven to 53°F leaving the indoor coil. If the unit is equipped with HGRH it shall modulate to maintain 60°F for the Discharge Air Temperature. Unoccupied cooling is enabled when space temperature reaches Unoccupied Cooling Setpoint +

be modulated to maintain 90°F for the Discharge Air Temperature. For heat pumps,

determination of heat pump operation or auxiliary heat operation is identical to

When no call for Unoccupied Heating or Unoccupied Dehumidification exists, Unoccupied Cooling Mode is enabled when the Space Temperature rises above the Unoccupied Cooling Setpoint + 2. Unoccupied Cooling Mode shall continue until the Space Temperature falls below the Unoccupied Cooling Setpoint - 2. During Unoccupied Cooling Mode the cooling is driven to 53°F leaving the indoor coil.

During Morning Warmup the unit will modulate the discharge air temperature to communicated via BAS. Binary Value Space Temp/Hum Sensor Installed must be set maintain 120 degrees. The unit must be in Occupied Mode and a value of 3 written to the multistate value Heat Cool Mode Request.

Main unit controller will modulate digital compressor to maintain either Evap Leaving Temp Setpoint or Discharge Air Cooling Setpoint depending on mode of operation. Remaining compressors will be staged as described in the mode for Discharge Control

Exhaust with Isolation Dampers When the indoor fan operation has been proven and the unit is in occupied there will

be a call for the exhaust. When there is a call for the exhaust the isolation dampers will be powered and the powered exhaust will be enabled once the end switch on the installed. If the unit is under Economizer conditions as described under the occupied exhaust damper actuators are proven. If the unit is equipped with modulating dampers, the exhaust fan speed will modulate to maintain the Return Duct/Space Pressure Setpoint (factory defaulted to 1" WC). If modulating dampers are not equipped, the exhaust will maintain a constant volume of airflow. During Unoccupied the powered exhaust will be shut off, except when the outdoor air conditions are in economizing **Energy Wheel Operation**

Space Temperature rises above the Unoccupied Heating Setpoint + 3. The heat shall

The ERV is interlocked with indoor fan and exhaust fan operation in occupied heating, dehumidification or cooling modes. When operating in Economizer or Ventilation Mode the ERV is disabled and the ERV by-pass dampers will open, powered exhaust remains on. If Economizer or Ventilation Mode has been enabled for 10 minutes the ERV will be enabled for one minute. This cycle will repeat every 10 minutes. Energy Wheel with Modulating Bypass on Supply During ERV operation, if the Exhaust Temperature drops below 25°F, the outdoor air bypass damper will start to slowly modulate open. If after the bypass dampers

> F (2°F Deadband) for 5 minutes, the unit controller will command the ERV off. During Unoccupied the ERV will be shut off. **Energy Wheel with Optional Rotation Sensor** On units equipped with an optional rotation sensor, when there is a call for energy wheel operation if no rotation is detected for a 90 second period then the energy wheel shall be commanded off and the controller will signal an alarm.

BUILDING AUTOMATION SYSTEM - GENERAL NOTES

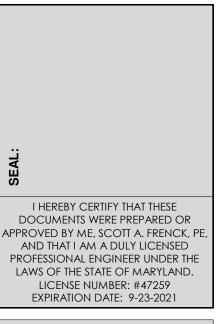
Controls contractor to provide HVAC controls, per design drawings, integrated with Owner's Siemens controls system. All control points, alarms, schedules, etc.

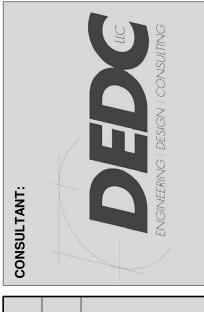
to be relayed to/from Owner's central (off-site) system.

- Equipment Vendor to provide integrated controls if available to achieve Sequence of Operation, otherwise the BAS vendor shall
- All Hardware points to be provided by Equipment Vendor if possible, otherwise the BAS vendor shall provide
- No "stand alone" controls allowed unless approved by Owner / Engineer
- Graphics packages on Owner's central (off-site) system will display specific alarms, setpoints, temperatures, flows, etc. Equipment scheduling to be programmable via Owner's central (offsite) system

	Hardware Points						Softwar	e Points			
Point Name	AI	AO	ВІ	ВО	AV	BV	Loop	Sched	Trend	Alarm	Show Or Graphic
Exhaust Air Temp	х								х		х
Final Filter Differential Pressure	x								x		
Heat Wheel Discharge Air Temp	х								х		х
Mixed Air Temp	х								х		х
Outside Air Humidity	х								х		х
Outside Air Temp	х								х		Х
Outside Air Temp	х								х		Х
Prefilter Differential Pressure	х								х		
Return Air Humidity	x								X		Х
Return Air Temp	x								x		Х
Supply Air Temp	X								x		Х
Zone Setpoint Adjust	X								^		X
									.,		
Zone Temp	X								Х		Х
Heat Wheel VFD Speed		X							Х		Х
Mixed Air Dampers		X							Х		X
Freezestat			Х						Х	Х	х
Heat Wheel Status			Х						х		х
Heat Wheel VFD Fault			х						х	х	х
Return Air Smoke Detector			х						x	х	x
Return Fan Status			х						х		х
Supply Air Smoke Detector			х						х	х	х
Supply Fan Status			х						х		х
Zone Override			Х						х		х
Cooling Stage 1				X					x		х
Cooling Stage 2				X					x		Х
Cooling Stage 3				X					x		Х
Cooling Stage 4				X					X		X
Heat Wheel Bypass Dampers											
				Х					X		Х
Heat Wheel Start/Stop				X					Х		X
Heating Stage 1				X					Х		Х
Heating Stage 2				Х					Х		Х
Heating Stage 3				Х					х		х
Heating Stage 4				Х					х		х
Return Fan Start/Stop				х					х		х
Supply Fan Start/Stop				Х					х		х
Cooling Setpoint					х				x		x
Dehumidification Setpoint					х				х		х
Economizer Zone Temp Setpoint					х				х		х
Heating Setpoint					х				х		х
Schedule								Х			
Compressor Runtime Exceeded										х	
Final Filter Change Required										X	Х
Heat Wheel in Hand										X	
Heat Wheel Rotation Failure											
										Х	
Heat Wheel Runtime Exceeded										Х	
High Mixed Air Temp										X	
High Return Air Humidity										Х	
High Return Air Temp										Х	
High Supply Air Temp										Х	
High Zone Temp										х	
Low Mixed Air Temp										х	
Low Return Air Humidity										х	
Low Return Air Temp										х	
Low Supply Air Temp										х	
Low Zone Temp										Х	
Prefilter Change Required										х	Х
Return Fan Failure										X	
Return Fan in Hand										X	
Return Fan Runtime Exceeded										X	
Supply Fan Failure										Х	
Supply Fan in Hand										Х	
Supply Fan Runtime Exceeded	1									Х	
Totals	13			12					38		39





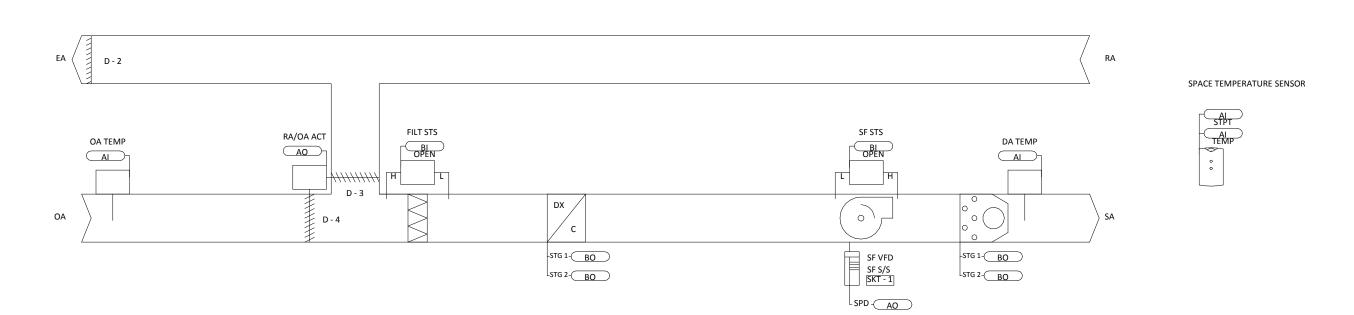


DESCRIPTION

PROJECT SET: DATE ISSUED:

12/23/2019 DRAWING TITLE: MECHANICAL CONTROL DIAGRAMS SHEET NUMBER:

1 HVAC SEQUENCES OF OPERATION - ANIMAL DOAS UNITS
NOT TO SCALE



Sequence of Operations

Building Automation System Interface:
The Building Automation System (BAS) shall send the controller Occupied Bypass, Morning Warm-up /
Pre-Cool, Occupied / Unoccupied and Heat / Cool modes. If a BAS is not present, or communication is lost with the BAS the controller shall operate using default modes and setpoints.

During occupied periods, the supply fan shall run continuously and the outside air damper shall open to maintain minimum ventilation requirements. The DX cooling and gas heat shall stage to maintain the occupied space temperature setpoint. If economizing is enabled the outside air damper shall modulate to maintain the occupied space temperature setpoint.

When the space temperature is below the unoccupied heating setpoint of 60.0 deg. F (adj.) the supply fan shall start, the outside air damper shall remain closed and the gas heat shall be enabled. When the space temperature rises above the unoccupied heating setpoint of 60.0 deg. F (adj.) plus the unoccupied differential of 4.0 deg. F (adj.) the supply fan shall stop and the gas heat shall be disabled. When the space temperature is above the unoccupied cooling setpoint of 85.0 deg. F (adj.) the supply fan shall start, the outside air damper shall open if economizing is enabled and remain closed if economizing is disabled and the DX cooling shall be enabled. When the space temperature falls below the unoccupied cooling setpoint of 85.0 deg. F (adj.) minus the unoccupied differential of 4.0 deg. F (adj.) the supply fan shall stop, the DX cooling shall be disabled and the outside air damper shall close.

Optimal Start:
The BAS shall monitor the scheduled occupied time, occupied space setpoints and space temperature to calculate when the optimal start occurs.

Morning Warm-Up Mode:

During optimal start, if the space temperature is below the occupied heating setpoint a morning warm-up mode shall be activated. When morning warm-up is initiated the unit shall enable the heating and supply fan. The outside air damper shall remain closed. When the space temperature reaches the occupied heating setpoint (adj.), the unit shall transition to the occupied mode.

Pre-Cool Mode:

During optimal start, if the space temperature is above the occupied cooling setpoint, pre-cool mode shall be activated. When pre-cool is initiated the unit shall enable the fan and cooling or economizer. The outside air damper shall remain closed, unless economizing. When the space temperature reaches occupied cooling setpoint (adj.), the unit shall transition to the occupied mode.

The BAS shall monitor the scheduled unoccupied time, occupied setpoints and space temperature to calculate when the optimal stop occurs. When the optimal stop mode is active the unit controller shall maintain the space temperature to the space temperature offset setpoint.

Occupied Bypass:

The BAS shall monitor the status of the "on" and "cancel" buttons of the space temperature sensor. Whe an occupied bypass request is received from a space sensor, the unit shall transition from its current occupancy mode to occupied bypass mode and the unit shall maintain the space temperature to the

Cooling Mode:

The unit controller shall monitor space temperature and space temperature cooling setpoint to determine when to initiate requests for cooling. When the space temperature rises above the space temperature cooling setpoint, the unit controller shall modulate the economizer or stage the mechanical cooling On or Off as required to maintain the space temperature cooling setpoint. The first compressor shall energize after its minimum 3-minute off time has expired. The supply fan shall modulate above minimum speed to meet zone requirements. If additional cooling capacity is required the next stage of cooling shall be enabled. Once the space temperature falls below the setpoint the compressors shall be deactivated and the fan shall modulate to minimum speed.

Heating Mode:

The unit controller shall monitor space temperature and space temperature heating setpoint to determine when to initiate requests for heat. When the space temperature drops below the space temperature heating setpoint, the controller shall enable the first stage of heat. If additional heating capacity is required the second stage of heat shall be enabled. The supply fan will remain at 100% during heating operation. Once the space temperature rises above the setpoint, the heating stages shall be disabled and the supply fan speed will vary according to ventilation and cooling modes.

Economizer Control / Reference Dry Bulb:

The supply air sensor shall measure the dry bulb temperature of the air leaving the evaporator coil while economizing. When economizing is enabled and the unit is operating in the cooling mode, the economizer damper shall modulate between its minimum position and 100% to maintain the space temperature setpoint. Minimum position shall be calculated based on supply fan speed. If the supply air temperature starts to fall below supply air temperature setpoint, the outdoor damper shall be at minimum position. Compressors shall be delayed from operating until the economizer has opened to 100% for 5 minutes.

Reference Dry Bulb:

Outside air temperature is compared with a reference dry bulb point. The economizer is enabled when outdoor air temperature is less than reference dry bulb point. The economizer is disabled when outdoor air temperature is greater than reference dry bulb point + 5.0 deg. F.

Supply Fan Operation:
The supply fan shall be enabled while in the occupied mode and cycled on during the unoccupied mode.
The unit controller shall vary the supply fan speed to optimize minimum fan speed in all cooling modes. A differential pressure switch shall monitor the differential pressure across the fan. If the switch does not open within 40 seconds after a request for fan operation a fan failure alarm shall be annunciated, the unit shall stop, requiring a manual reset.

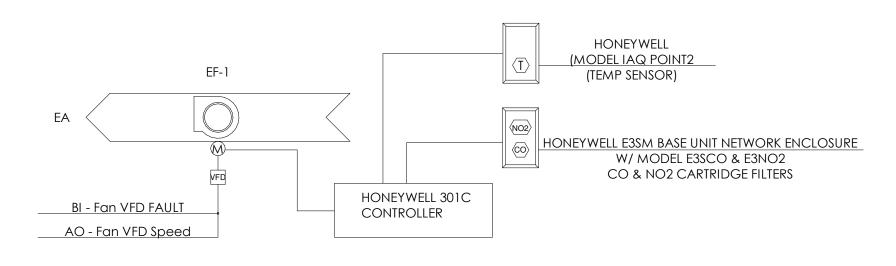
Building Pressure Control:The barometric relief dampers shall open with increased building pressure. As the building pressure increases, the pressure in the unit return section also increases, opening the dampers and relieving air.

Filter Status:

A differential pressure switch shall monitor the differential pressure across the filter when the fan is running. If the switch closes for 2 minutes after a request for fan operation a dirty filter alarm shall be annunciated at

HVAC SEQUENCES OF OPERATION - RTU-1, -2, -3, -4

NOT TO SCALI



Exhaust Fan (EF-1) - Normal Operation Mode

NOTE:

THE FOLLOWING SEQUENCE OF OPERATION SHALL BE INCLUDED AS PART OF THE HONEYWELL E-2 SYSTEMS

Run Conditions - Scheduled

Heating Season Operation:

The fan shall be off normally (Apparatus Bay minimum ventilation by EF-2, which

runs 24/7)

Cooling Season Operation:

Upon an increase in zone temperature above cooling setpoint, he fan speed shall be increased from minimum to maximum speed based on zone temperature range

Exhaust Fan (EF-1) Emergency Mode - Nitrogen Dioxide / Carbon Monoxide

Run Conditions - The exhaust fan speed will increase to maximum on sensing of High Nitrogen Dioxide and/or Carbon Monoxide levels:

CO 25ppm (adj), NO2 1ppm (adj)

Alarms shall be provided as follows:

High Zone Carbon Monoxide: If the zone carbon monoxide is greater than 40ppm (adj)
High Zone Nitrogen Dioxide: If the zone nitrogen dioxide is greater than 4 ppm (adj)

Alarms shall be provided as follows:

• Fan Failure: Commanded on, but the status is off.

Fan in Hand: Commanded off, but the status is on.

Fan Runtime Exceeded: Fan status runtime exceeds a user definable limit

SEQUENCE OF OPERATIONS - SALLYPORT EXHAUST FAN EF-2

NOT TO SCA

BAS TEMP SENSOR

FREEZER HIGH TEMPERATURE ALARM

Alarms shall be provided as follows:

• High Zone Temp: If the zone temperature is greater than the cooling setpoint by a user definable amount (adj.).

SEQUENCE OF OPERATIONS - FREEZER TEMPERATURE MONITORING

NOT TO SCALE

Software Points Hardware Points Point Name Mixed Air Temp Х Χ Outside Air Humidity х Χ Outside Air Temp Х x Return Air Humidity Х x Χ Return Air Temp Χ x Χ Zone Setpoint Adjust X Zone Temp x x X Mixed Air Dampers x x x x Freezestat Return Air Smoke Detector Supply Air Smoke Detector X x x x Supply Fan Status Х Zone Override Х Х Cooling Stage 1 Х x X Cooling Stage 2 x Х Х Cooling Stage 3 Χ x Cooling Stage 4 Х х Heating Stage 1 Х x Χ Heating Stage 2 х x Χ Heating Stage 3 x Χ Heating Stage 4 Х x Supply Fan Start/Stop Х x Χ Cooling Setpoint X x Χ Dehumidification Setpoint x x Economizer Zone Temp Setpoint x х Heating Setpoint x Х Schedule Compressor Runtime Exceeded High Mixed Air Temp High Return Air Humidity Χ High Return Air Temp Х High Zone Temp x | Low Mixed Air Temp x Low Return Air Humidity Low Return Air Temp Х Low Zone Temp x Supply Fan Failure Supply Fan in Hand Supply Fan Runtime Exceeded Χ 7 1 5 9 4 0 0 1 25 15 Total Software (45) + Graphics (26) Total Hardware (22)

RTU BUILDING AUTOMATION POINTS LIST

NOT TO SCAL

		Hardwar	e Points								
Point Name	Al	AO	ВІ	во	AV	BV	Loop	Sched	Trend	Alarm	Show On Graphic
Space Carbon Monoxide PPM	х								х		х
Space NO2 PPM	х								х		х
Exhaust Fan Status			х						х		х
Exhaust Fan Start/Stop				Х					х		х
CO/NO2 Setpoint PPM					х				х		х
High Space Carbon Monoxide Concentration										х	
High Space NO2 Concentration										х	
Exhaust Fan Failure										х	
Exhaust Fan in Hand										х	
Exhaust Fan Runtime Exceeded										х	
Totals	2	0	1	1	1	0	0		5	5	5

SALLYPORT EXHAUST BUILDING AUTIOMATION POINTS LIST

		Hardware Points				Software Points							
Point Name	AI	АО	ВІ	во	AV	BV	Loop	Sched	Trend	Alarm	Show Or Graphic		
High Zone Temp										х	х		
Totals	0	0	0	0	0	0	0	0	0	1	1		
Total F	Total Hardware (0)							Total Software (1) + Graphics (1)					

FREEZER BUILDING AUTOMATION POINTS LIST

6 NOT TO SCALE

BUILDING AUTOMATION SYSTEM - GENERAL NOTES

Controls contractor to provide HVAC controls, per design drawings, integrated with Owner's Siemens controls system. All control points, alarms, schedules, etc.

to be relayed to/from Owner's central (off-site) system.

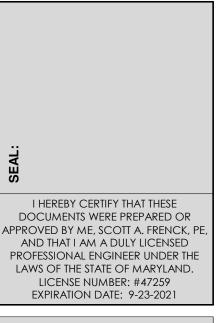
- Equipment Vendor to provide integrated controls if available to achieve Sequence of Operation, otherwise the BAS vendor shall provide
- All Hardware points to be provided by Equipment Vendor if possible, otherwise the BAS vendor shall provide
- No "stand alone" controls allowed unless approved by Owner / Engineer
- Graphics packages on Owner's central (off-site) system will display specific alarms, setpoints, temperatures, flows, etc.
- Equipment scheduling to be programmable via Owner's central (off-site) system

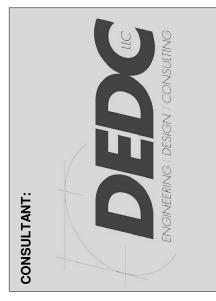
STUDIOS

ARCHITECTURE + MASTER PLANNING

10839-D PHILADELPHIA RD
WHITE MARSH, MD 21162

(P) 410-344-1460
(F) 443-403-2460
(E) INFO@MWSARCH.COM
WWW.MWSARCH.COM

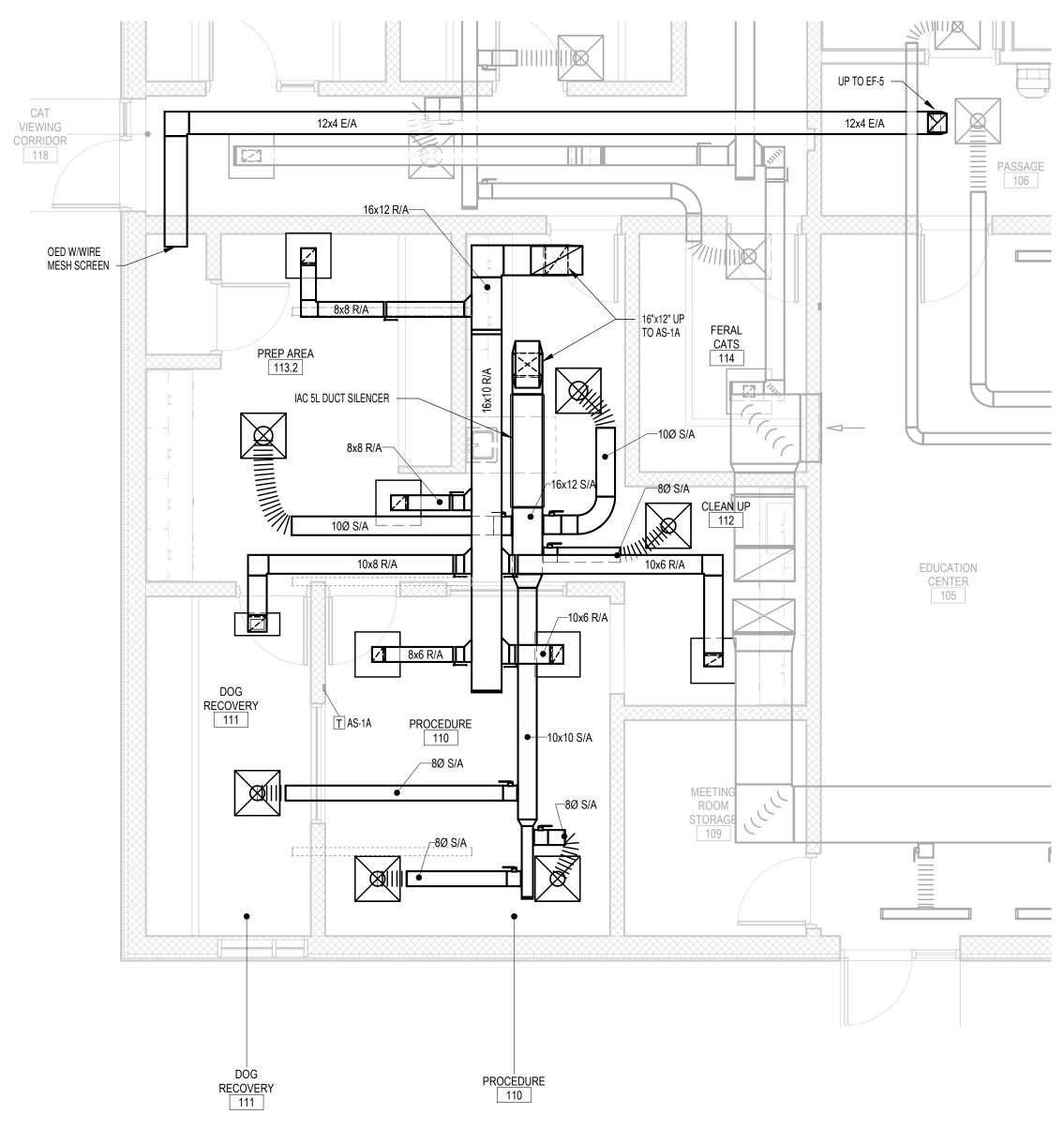


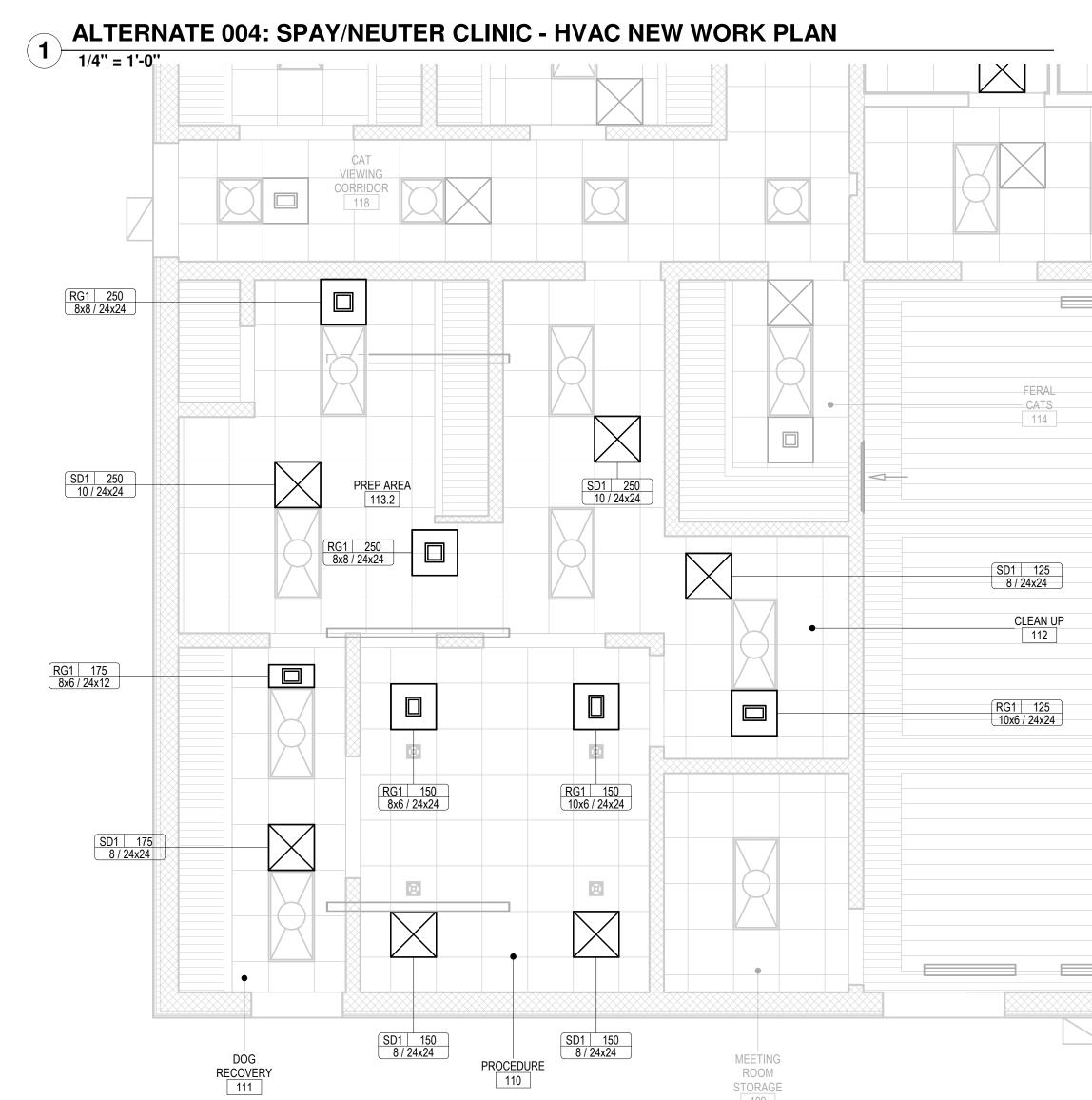


CHARLES COUNTY ANIMAL CARE CENT 5690 PINEY CHURCH ROAD WALDORF, MARYLAND 20602

PROJECT NUMBER:
18-034
PROJECT SET:
PERMIT
DATE ISSUED:

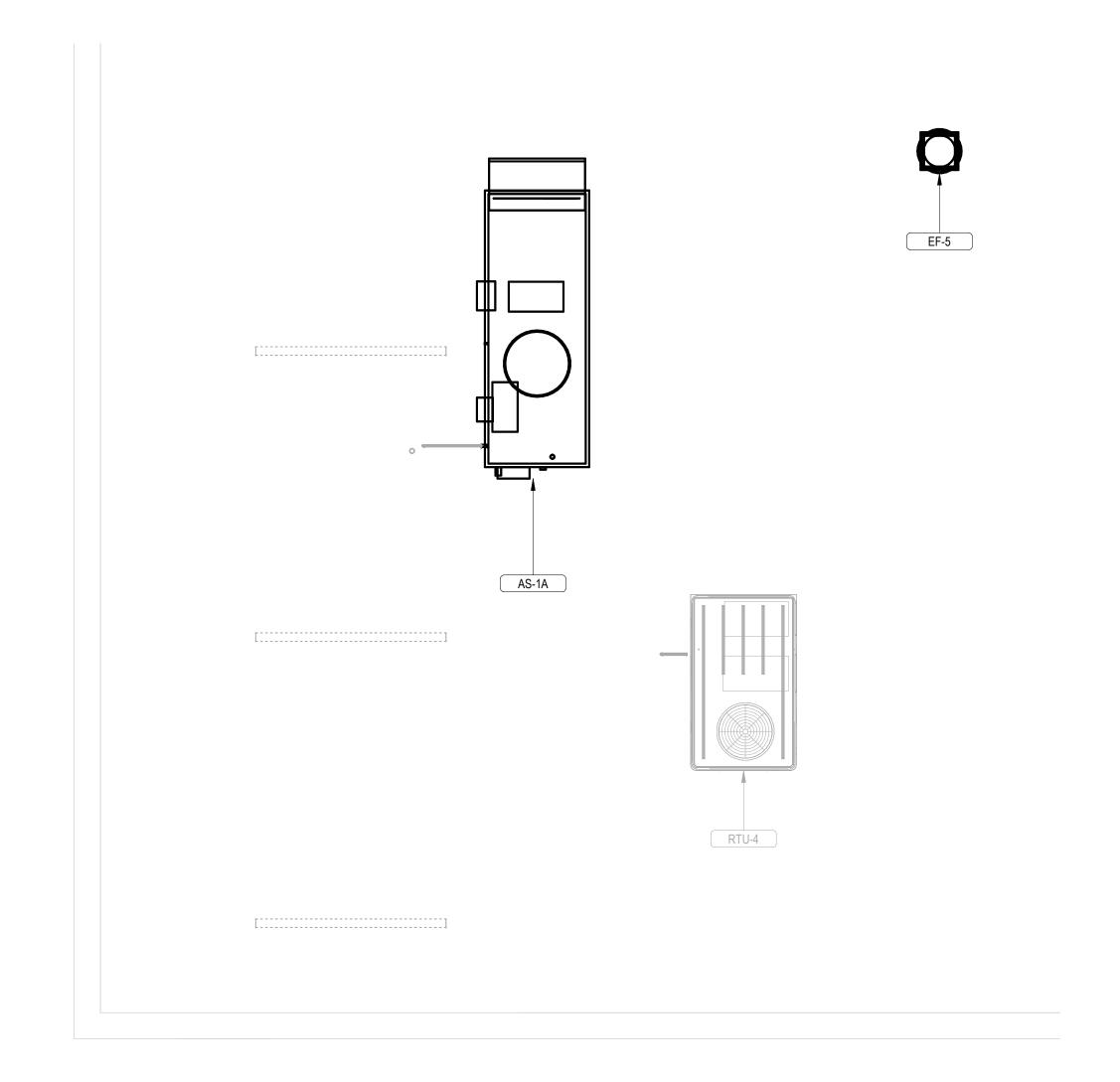
DRAWING TITLE:
MECHANICAL CONTROL
DIAGRAMS
SHEET NUMBER:





ALTERNATE 004: SPAY/NEUTER CLINIC - REFLECTED CEILING PLAN

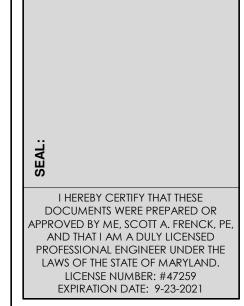
1/4" = 1'-0"

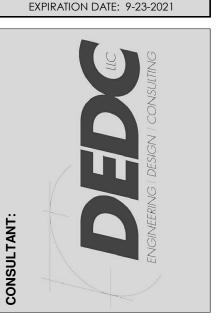


ALTERNATE 004: SPAY/NEUTER CLINIC - HVAC ROOFTOP NEW WORK PLAN

1/4" = 1'-0"







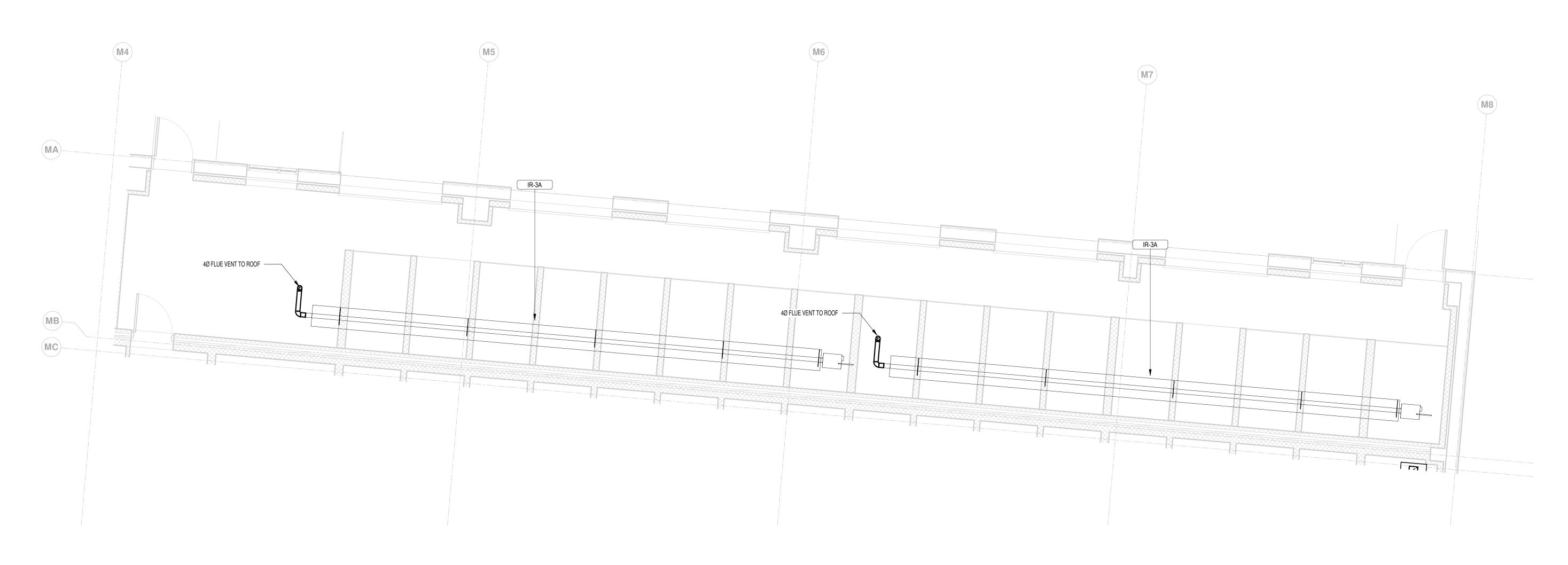
CHARLES COUNTY
CHARLES COUNTY ANIMAL CARE CENTER
5690 PINEY CHURCH ROAD
WALDORF, MARYLAND 20602

PROJECT NUMBER:
18-034
PROJECT SET:
PERMIT
DATE ISSUED:

NO. DESCRIPTION DATE

DRAWING TITLE:
ALTERNATE 004 SPAY/NEUTER CLINIC
SHEET NUMBER:
M1001

12/23/2019



ALTERNATE 006: OUTDOOR DOG RUN HEATERS - HVAC NEW WORK PLAN

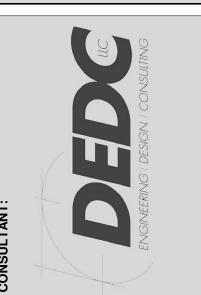
1/4" = 1'-0"

	ALTERNATE 006 - GAS	FIRED R	ADIAN	NT HEATE	R SC	HEDUL	E - (DUTE	000	R DOC	S RUN DOORS
					GAS			ELECTRICAL			
Identity				Mir	nimum Inlet	Maximum Inlet		Number			
Mark Count	Description	Manufacturer	Model	Heating Input	Pressure	Pressure	Voltage	of Poles	Frequency	Full Load Amps	Type Comments
IR-3A 2	Vantage Premium Harsh Environment Gas Fired Heater with High Efficiency Reflectors	Roberts Gordon®	HEV-125	125000 Btu/h 4.60	0 in-wg	14.00 in-wg	120 V	1	60 Hz		USE ZERO BOUNCE BACK, 12 SURFACE, PARABOLIC REFLECTORS RATED AT EF-15 AS TESTED BY AHRI 1330 STANDARD. PROVIDE NEMA 4X MOISTURE RESISTANT LINE VOLTAGE THERMOSTAT. REFLECTORS SHALL BE ANGLED AT 45 DEGREES INTO SPACE.

INCLUDE COMPLETE SYSTEM, BURNER/PUMPS/CONTROL PANEL MOUNTING HARDWARE
 TUBING SHALL BE HEAT TREATED ALUMINIZED OR HOT ROLLED STEEL AS INDICATED ON PLAN DRAWINGS.
 ALL BURNERS SHALL HAVE COMBUSTION INTAKE FILTERS.
 PROVIDE 120V, 20 AMP SYSTEM CONTROL PANEL, MANUFACTURER MODEL #0277002 AND RECOMMENDED 24-VOLT THERMOSTATS.

ARCHITECTURE + MASTER PLANNING 10839-D PHILADELPHIA RD WHITE MARSH, MD 21162 (P) 410-344-1460 (F) 443-403-2460 (E) INFO@MWSARCH.COM WWW.MWSARCH.COM

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LICENSE NUMBER: #47259
EXPIRATION DATE: 9-23-2021



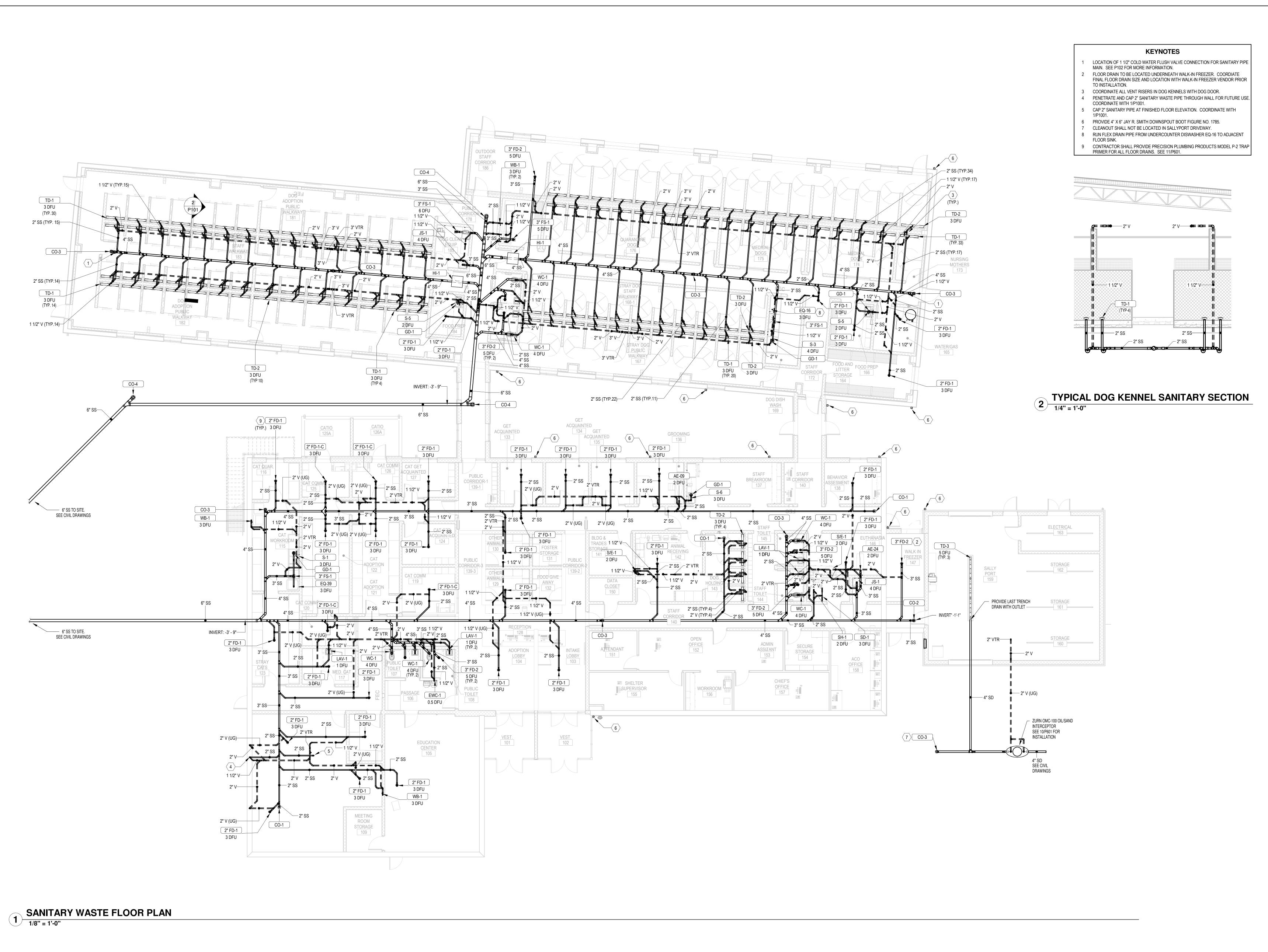
CHARLES COUNTY
CHARLES COUNTY ANIMAL CARE CENTER
5690 PINEY CHURCH ROAD
WALDORF, MARYLAND 20602

NO. DESCRIPTION DATE

PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE:

ALTERNATE 006-OUTDOOR DOG RUN HEATERS
SHEET NUMBER:



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ARCHITECTURE + MASTER PLANNING

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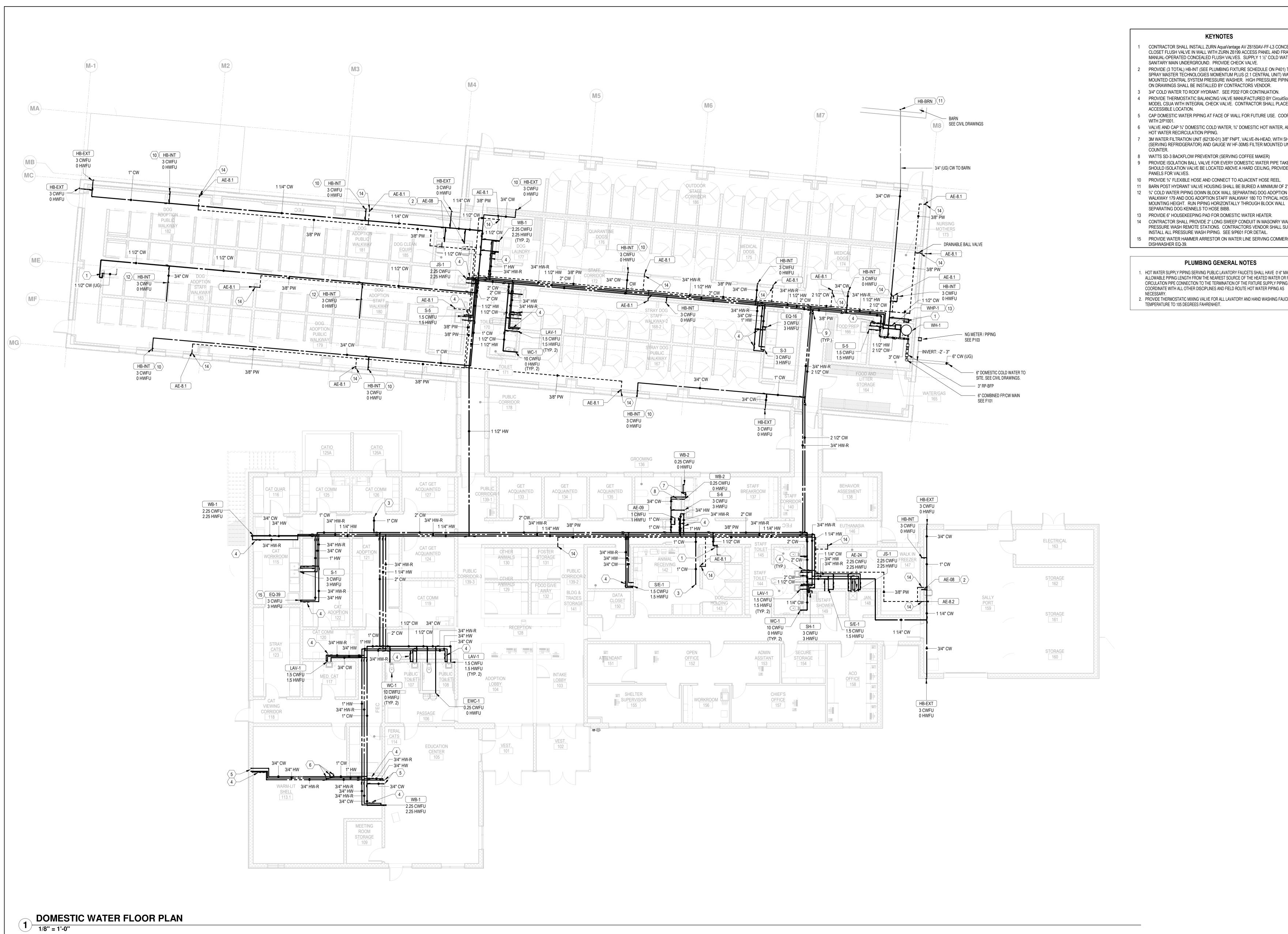
HARLES COUNTY ANIMAL CARE CENTERS PINEY CHURCH ROAD ALDORF, MARYLAND 20602

NO. DESCRIPTION DATE

PROJECT NUMBER: 18-034

PROJECT NUMBE 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE:
SANITARY WASTE & VENT
FLOOR PLAN



KEYNOTES

- CONTRACTOR SHALL INSTALL ZURN AquaVantage AV Z6150AV-FF-L3 CONCEALED CLOSET FLUSH VALVE IN WALL WITH ZURN Z6199 ACCESS PANEL AND FRAME FOR MANUAL-OPERATED CONCEALED FLUSH VALVES. SUPPLY 1 ½" COLD WATER TO SANITARY MAIN UNDERGROUND. PROVIDE CHECK VALVE.
- PROVIDE (3 TOTAL) HB-INT (SEE PLUMBING FIXTURE SCHEDULE ON P401) TO SERVE SPRAY MASTER TECHNOLOGIES MOMENTUM PLUS (2.1 CENTRAL UNIT) WALL MOUNTED CENTRAL SYSTEM PRESSURE WASHER. HIGH PRESSURE PIPING SHOWN
- ON DRAWINGS SHALL BE INSTALLED BY CONTRACTORS VENDOR. 3/4" COLD WATER TO ROOF HYDRANT. SEE P202 FOR CONTINUATION. PROVIDE THERMOSTATIC BALANCING VALVE MANUFACTURED BY CircuitSolver,
- MODEL CSUA WITH INTEGRAL CHECK VALVE. CONTRACTOR SHALL PLACE VALVE AT ACCESSIBLE LOCATION. CAP DOMESTIC WATER PIPING AT FACE OF WALL FOR FUTURE USE. COORDINATE
- WITH 2/P1001. VALVE AND CAP 3/4" DOMESTIC COLD WATER, 3/4" DOMESTIC HOT WATER, AND 3/4"
- HOT WATER RECIRCULATION PIPING. 3M WATER FILTRATION UNIT (62130-01) 3/8" FNPT, VALVE-IN-HEAD, WITH SHROUD (SERVING REFRIDGERATOR) AND GAUGE W/ HF-30MS FILTER MOUNTED UNDER
- WATTS SD-3 BACKFLOW PREVENTOR (SERVING COFFEE MAKER)
- PROVIDE ISOLATION BALL VALVE FOR EVERY DOMESTIC WATER PIPE TAKEOFF. SHOULD ISOLATION VALVE BE LOCATED ABOVE A HARD CEILING, PROVIDE ACCESS PANELS FOR VALVES. 10 PROVIDE 3/4" FLEXIBLE HOSE AND CONNECT TO ADJACENT HOSE REEL.
- BARN POST HYDRANT VALVE HOUSING SHALL BE BURIED A MINIMUM OF 2'-6". 12 3/4" COLD WATER PIPING DOWN BLOCK WALL SEPARATING DOG ADOPTION PUBLIC WALKWAY 179 AND DOG ADOPTION STAFF WALKWAY 180 TO TYPICAL HOSE BIBB
- SEPARATING DOG KENNELS TO HOSE BIBB. PROVIDE 6" HOUSEKEEPING PAD FOR DOMESTIC WATER HEATER. CONTRACTOR SHALL PROVIDE 2" LONG SWEEP CONDUIT IN MASONRY WALL AT ALL
- PRESSURE WASH REMOTE STATIONS. CONTRACTORS VENDOR SHALL SUPPLY AND INSTALL ALL PRESSURE WASH PIPING. SEE 9/P601 FOR DETAIL. 15 PROVIDE WATER HAMMER ARRESTOR ON WATER LINE SERVING COMMERCIAL

PLUMBING GENERAL NOTES

1. HOT WATER SUPPLY PIPING SERVING PUBLIC LAVATORY FAUCETS SHALL HAVE 0'-6" MAXIMUM ALLOWABLE PIPING LENGTH FROM THE NEAREST SOURCE OF THE HEATED WATER OR RE-CIRCULATION PIPE CONNECTION TO THE TERMINATION OF THE FIXTURE SUPPLY PIPING. COORDINATE WITH ALL OTHER DISCIPLINES AND FIELD ROUTE HOT WATER PIPING AS 2. PROVIDE THERMOSTATIC MIXING VALVE FOR ALL LAVATORY AND HAND WASHING FAUCETS. SET TEMPERATURE TO 105 DEGREES FAHRENHEIT.



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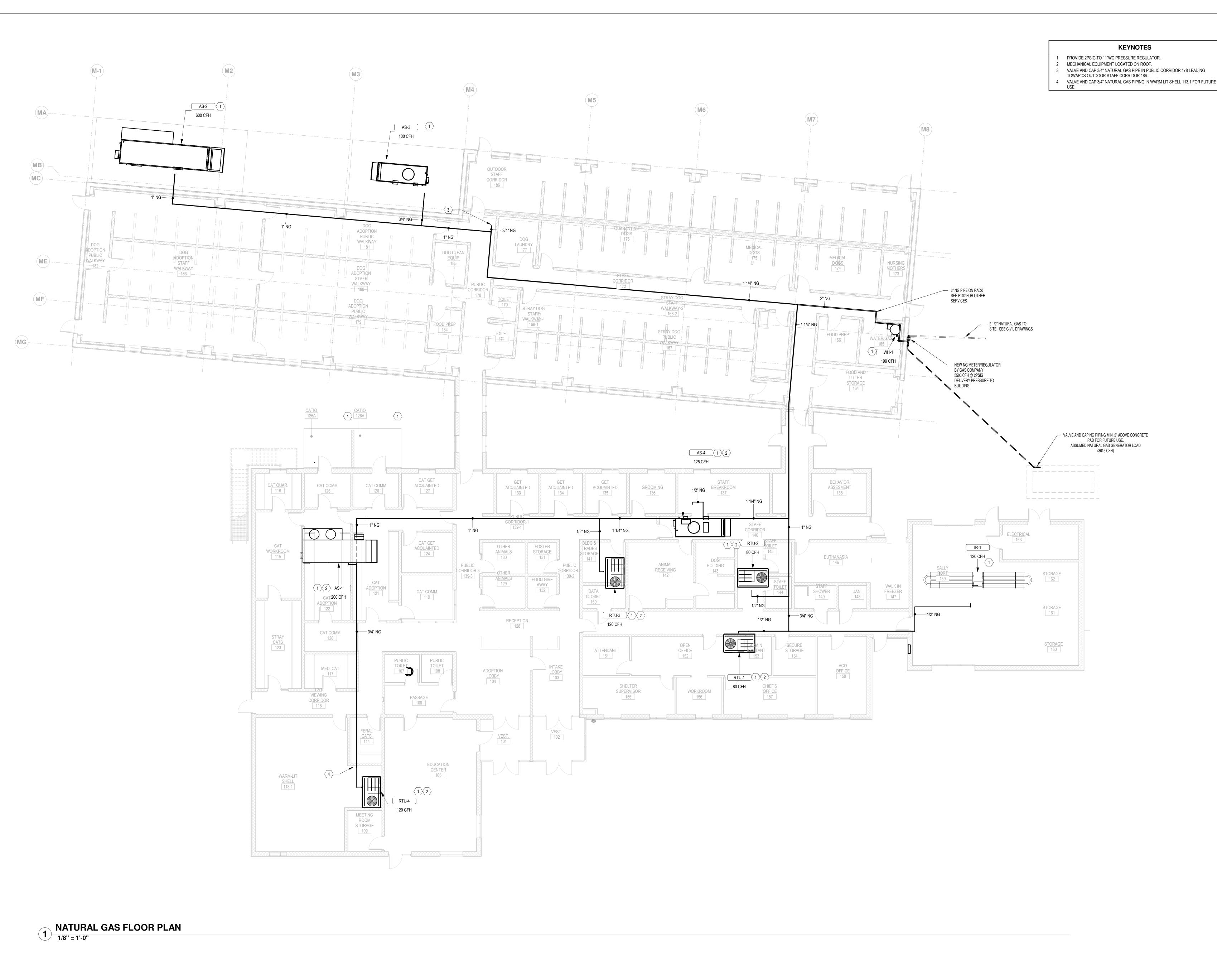
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DESCRIPTION DATE

PROJECT SET: DATE ISSUED:

12/23/2019 DRAWING TITLE: DOMESTIC WATER FLOOR PLAN



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WHITE MARSH, MD 21162

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5690 PINEY CHURCH ROAD
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NO. DESCRIPTION DATE

PROJECT NUMBE 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE:
NATURAL GAS FLOOR
PLAN

P103



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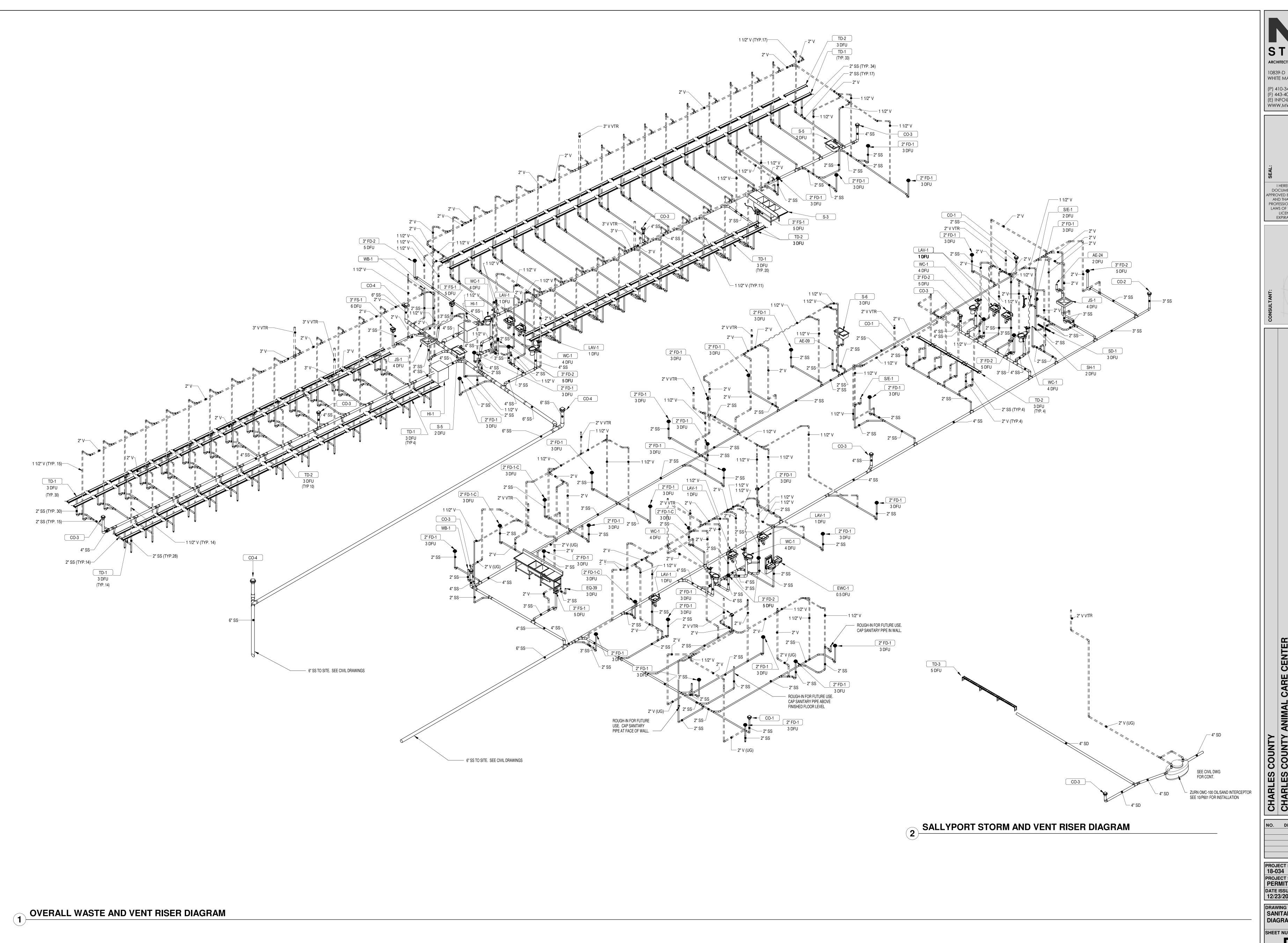
DRAWING TITLE:
ROOF PLUMBING PLAN

SHEET NUMBER:

P201

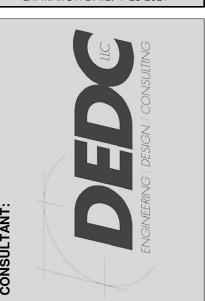
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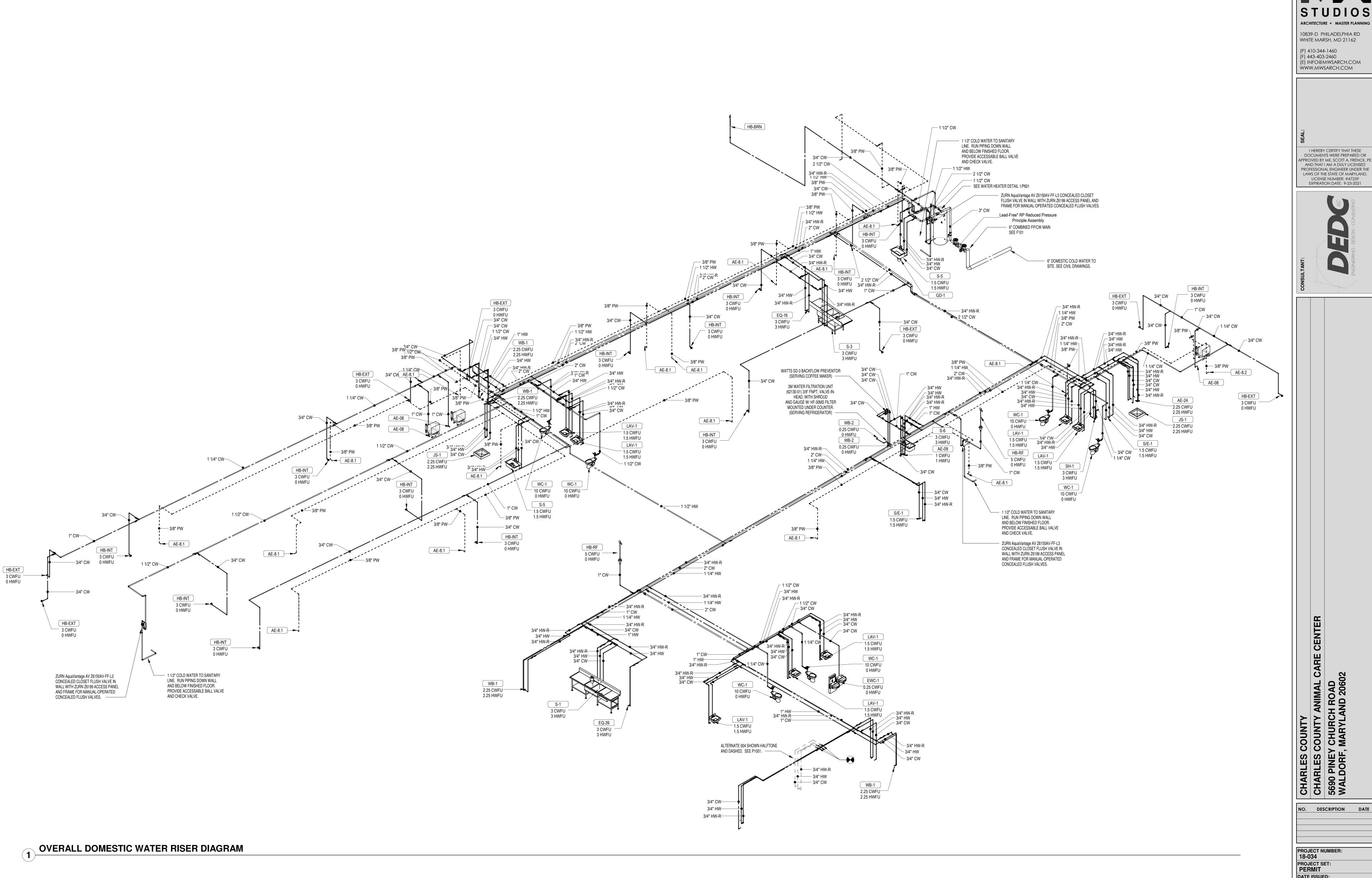
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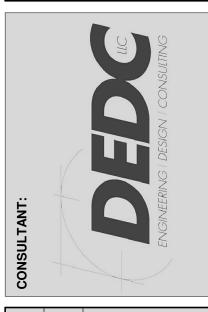
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> DRAWING TITLE:
> SANITARY/VENT RISER DIAGRAM SHEET NUMBER: P301



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PROJECT NUMBER: 18-034 PROJECT SET: PERMIT

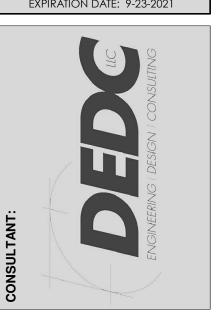
DATE ISSUED: 12/23/2019 DRAWING TITLE: DOMESTIC RISER DIAGRAM

GENERAL NOTES:

1. PROVIDE 2PSIG TO 11"WC PRESSURE REGULATOR FOR ALL GAS APPLIANCES. PROVIDE VENTS AS REQ'D.



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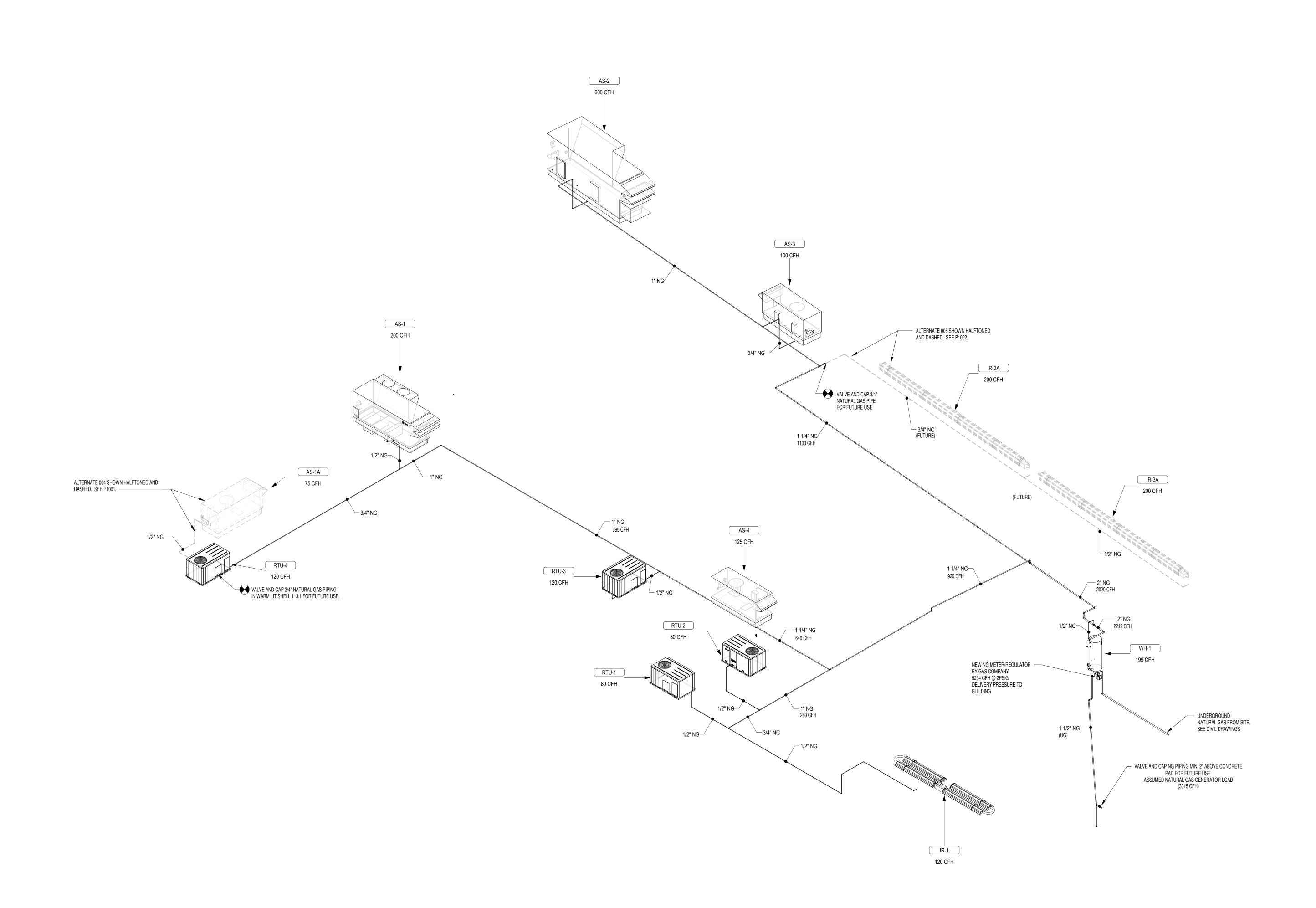
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DATE ISSUED: 12/23/2019

DRAWING TITLE: NATURAL GAS RISER DIAGRAM



											DOMESTIC FIXTURE SCHEDULE
						WASTE ROUGH-IN	INDIRECT WASTE	PIPE		ROUGH-IN	
D	DESCRIPTION	MANUFACTURER		MATERIAL DESCRIPTION	FINISH	PIPE SIZE	PIPE SIZE	SIZE		PIPE SIZE	SPECIFICATION STATE OF THE PROPERTY OF THE PRO
-08	WALL MOUNTED CENTRAL PRESSURE WASHER SYSTEM (BY G.C. VENDOR)	SPRAY MASTER TECHNOLOGIES	SMT 300-5300 3	STAINLESS STEEL	STAINLESS STEEL				3/4"		28"x28"x17", 2.6GPM, 2000WCY WALL MOUNTED CENTRAL SYSTEM WITH FAN COOLED (TEFC) INDUSTRIAL 5HP MOTOR, 3 CYLINDER GENERAL PUMP (GP-EZ2536EL), MASTER CONTROL WITH 24V CONTROL CIRCUITS, 3 REMOTE MANIFOLD, CHEMICAL INJECTED BY (1) SOLENOID, WATER LEVEL FLOAT SWITCH ASSEMBLY, LIQUID FILLED PRESSURE GAUGE (3000 PSI) FLOAT TANK, 6FT WATER INLET SUPPLY HOSE,
8.1	MASONRY REMOTE HOOKUP FOR CENTRAL PRESSURE	SPRAY MASTER	SMT300-5217 18	STAINLESS STEEL	STAINLESS				3/4"		STAINLESS STEEL REMOTE STATION WITH MORTAR GRIPPERS, SHUT-OFF QUICK CONNECT, TOP ENTRY, STAINLESS STEEL TUBBING, FRONT PORT, LOCKING COVER, DORR CATCH, AND ELECTRONIC CONTROLS. SUPPLIED WITH WALL MOUNTED HOSE REEL WITH MANUAL REWIND, 100FT HOSE MAX, 100F
	WASHER (BY G.C. VENDOR)	TECHNOLOGIES			STEEL						HIGH PRESSURE SUPPLY, 16" MOUNTING WIDTH. WITH QUICK COUPLER FOR HOOK-UP AT REMOTE STATION.
8.2	WALL MOUNTED PRESSURE WASH HOSE REEL (BY G.C. VENDOR)	SPRAY MASTER TECHNOLOGIES	SMT300-5240 1	STAINLESS STEEL	STAINLESS STEEL				3/4"		WALL MOUNT HOUSE REEL WITH MANUAL REWIND, POWDER COATED FINISH, 16" MOUNTING WIDTH, POWDER COATED STEEL HOSE GUIDE, SPRAY WAND STORAGE BRACKET, STEEL FRAME, HIGH IMPACT STRUCTURAL PLASTIC WHEEL, EXTERNAL SWIVEL ASSEMBLY AND FRICTION BRAKE, WALL MOU QUICK COUPLER FOR HOOK-UP AT THE REMOTE STATION. PROVIDE WITH 100 FT SMT HI-PRESSURE HOSE.
09	DOG BATH	SEE ARCH	SEE ARCH 1	-	-		2"		1/2"	1/2"	SEE ARCH
-24	WET TABLE	SHORE-LINE	904.3000.00 2	STAINLESS STEEL	STAINLESS STEEL		3"		1/2"	1/2"	PROVIDE ECONOMY DECK MOUNT FAUCET 804.0006.51 AND SOLID TOP PANEL ACCESSORY.
16	UNDERCOUNTER DISHWASHER	HOBART	LXeC HOT 1	STAINLESS STEEL	STAINLESS STEEL		2"			1/2"	FRONT OPENING, STAINLESS STEEL, SODIUM HYPOCHLORITE SOLUTION INJECTION, UNDERCOUNTER DISHWASHER.
39	HIGH TEMPERATURE VENTLESS DOOR-TYPE DISHWASHER	HOBART	AM15VL 1	STAINLESS STEEL	STAINLESS STEEL		2"			1/2"	HIGH TEMPERATURE ADVANSYS VENTLESS DISHWASHING MACHINE WITH ENERGY RECOVERY, DIGITAL CONTROLS, AUTO DOOR START WITH AUTO FILL & AUTO DRAIN CLOSURE, UP TO 40 RACKS PER HOUR, 0.74 GALLONS PER RACK.
C-1	WATER COOLER - DUAL HEIGHT	ELKAY	EZSTL8WSSK 1	GALVANIZED STEEL	STAINLESS STEEL CABINET	2"		1-1/2"	1/2"		TWO LEVEL WALL HUNG WATER COOLER WITH BOTTLE FILLING STATION. THE UNIT SHALL BE COMPLETE WITH CABINET, MOUNTING FRAME, SELF CLOSING EASY TOUCH SIDE AND FRONT PUSHBAR CONTROLS, FLEXIGUARD SAFETY BUBBLER, REFRIGERATING SYSTEM, AIR COOLED, 120 VOLT, 60 CY SINGLE PHASE POWER CONNECTION, FULLY AUTOMATIC, COMPLETE AND READY TO OPERATE.
RN	NON-FREEZE POST HYDRANT	Jay R. Smith Mfg. Co.	5910 1						3/4"		NON-FREEZE 3/4" BRONZE POST HYDRANT WITH CAST IRON CASING GUARD, AND "T" HANDLE KEY. INLET AND HOSE CONNECTION SIZE FURNISHED AS INDICATED BY FIGURE NUMBER SELECTED.
Τ	1/4 TURN NON-FREEZE HYDRANT	Jay R. Smith Mfg. Co.	5515 7						3/4"		BRONZE QUARTER TURN NON-FREEZE AUTOMATIC DRAINING HYDRANT WITH STAINLESS STEEL FACE, HOSE CONNECTION, INTEGRAL VACUUM BREAKER, INTEGRAL SERVICE SHUT-OFF VLAVE, DUAL CHECK VALVE, "T" HANDLE KEY AND STAINLESS STEEL BOX WITH FULL 180 DEGREE COVER OPENIN
NT	1/4 TURN WALL HYDRANT WITH EXPOSED HOSE CONNECTION	Jay R. Smith Mfg. Co.	5609QT 13						3/4"		BRONZE NICKEL PLATED QUARTER TURN NON-FREEZE HYDRANT WITH 3/4" HOSE CONNECTION, BACKER PLATE, INTEGRAL VACUUM BREAKER WITH VANDAL RESISTANT CAP AND "T" HANDLE KEY.
RF	NON- FREEZE ROOF HYDRANT	Jay R. Smith Mfg. Co.	5906 2						1"		NON-FREEZE TYPE ROOF HYDRANT, WITH ASSE 1052 DOUBLE CHECK BACKFLOW PREVENTER, VALVE ON THE INSIDE OF THE ROOF, HOSE CONNECTION WITH BACKFLOW PREVENTER, AND CLOCKING HANDLE ON THE OUTSIDE OF THE ROOF. ALL EXPOSED PARTS SHALL BE PAINTED. MAKE ARRANGEMENTS WITH THE GENERAL CONTRACTOR TO PROVIDE THE NECESSARY SUPPORT OF ROOF. PROVIDE SHUTOFF VALVE IN ACCESSIBLE LOCATION AND ROUTE DRAIN.
1	TERRAZZO-WARE MOP SINK - DROP FRONT SERIES	Acorn Engineering Company	TDF-24 2	MOLDED STONE			3"		3/4"	3/4"	WITH TWO HANDLE, 8" CENTERSET, WALL MOUNTED, UTILITY FAUCET. FAUCET FEATURES BRASS CONSTRUCTION WITH ROUGH CHROME FINISH, PAIL HOOK WITH 9-1/4" REACH, WALL BRACE, VACUUM BREAKER, THREADED SPOUT & 1/2" NPTF SUPPLY INLETS. OPTION KCF.
/-1	20"x18" WALL HUNG LAVATORY WITH HALF PEDESTAL	SLOAN	SS-3003 7	WHITE VITREOUS CHINA	WHITE		2"		1/2"	1/2"	ZURN Z5344-PED 20"x18" VITREOUS CHINA WALL HUNG LAVATORY WITH 4" CENTER FAUCET HOLES AND HALF PEDESTAL. PROVIDED WITH HANGER PLATE AND HOLES FOR CONCEALED ARM CARRIER SYSTEMS. FURNISH WITH SLOAN SF-2350 POLISHED CHROME-PLATED 4" CENTERSET BATTERY-POWERED SEENSOR FAUCET.
1	Spec-Master MARINE PREP TABLE - TWO COMPARTMENT STAINLESS STEEL SINK	EAGLE GROUP	SMPT30120 1	STAINLESS STEEL	STAINLESS STEEL		2"		1/2"	1/2"	TWP 24"X10"X12" DEE[STAINLESS STEEL SINKS WITH LEVER DRAINS, OVERFLOWS, AND BRACKETS. SUPPLY WITH T&S MODEL B-0290-04 STANDARD FAUCET, 8" SPOUT, STANDARD, SPASH MOUNTED.
3	Spec-Master FFN SERIES FLUSH FRONT SINKS - THREE COMPARTMENT STAINLESS STEEL SINK	EAGLE GROUP	FFN2754-3-30-14/3 1	STAINLESS STEEL	STAINLESS STEEL		2"		1/2"	1/2"	FFN FLUSH FRONT SINK. DRAINBOARDS AND SINK BOWL PARTITIONS, FRONT PANEL, SINK BOWL EXTERIOR WRAPPER, AND BACKSPLASH. PROVIDE WITH T&S MODEL B-0290-04 STANDARD SPLASH MOUNTED SPARY UNIT WITH POWERFULSE SPRAY VALVE MODEL B-0167.
1	SURGERY HAND SINK WITH FOOT CONTROLS	ELKAY	CHS1716C 1	STAINLESS STEEL	STAINLESS STEEL		2"		1/2"	1/2"	ELKAY STAINLESS STEEL 16-34"X15-1/2"X13", SINGLE BOWL WALL HUNG HANDWASH SINK KIT. CHS17162 SINK, LK940GN04L2H FAUCET, LK8 DRAIN FITTING, AND LK500 P-TRAP WITH FOOT CONTROLS.
5	31"x22"x11-5/8" SINGLE BOWL DROP-IN SINK	ELKAY	DLR312212 2	STAINLESS STEEL	STAINLESS STEEL		2"		1/2"		ELKAY LUSTERSTONE CLASSIC STAINLESS STEEL 31"x22"x11-5/8" SINGLE BOWL DROP IN SINK. SINK IS MANUFACTURED FROM 18 GUAGE 304 STAINLESS STEEL WITH A LUSTROUS SATIN FINISH, CENTER DRAIN PLACEMENT, AND BOTTOM ONLY PADS. FURNISH WITH ELKAY FAUCET MODEL LK1001CR EVERYDAY FOUR HOLE DECK MOUNT KITCHEN FAUCET WITH LEVER HANDLE AND SIDE SPRAY AND ESCUTCHEON CHROME.
5	PEKEO 29"x18" DOUBLE BOWL STAINLESS STEEL KITCHEN SINK	AMERICAN STANDARD	PEKOE 29x18 1	STAINLESS STEEL	STAINLESS STEEL		2"		1/2"	1/2"	PROVIDE WITH AMERICAN STANDARD PEKOE SINGLE CONTROL PULL-DOWN KITCHEN FAUCET MODEL NUMBER 4332.310.F15.
1	SINK WITH EYEWASH STATION. (SEE ARCH)	ELKAY	LK800GN08T6 3	STAINLESS STEEL	STAINLESS STEEL		2"		1/2"		SINK BY GENERAL CONTRACTOR, PROVIDE SANITARY PIPING. PROVIDE FAUCET AND EYEWASH STATION. ELKAY 8" CENTERSET WITH CONCEALED DECK FAUCET WITH 8" GOOSENECK SPOUT 6" WRISTBLADE HANDLES CHROME. FAUCET HAS A FLOW RATE OF 1.5 GPM. GAURDIAN G1200 EYESAFE FAUCET-MOUNTED EYEWASH WITH FAUCET CONTROL VALVE.
1	SHOWER STALL - ADA (SEE ARCH)	PROFLO	PFHS204GCP 1	ABS PLASTIC & METAL	CHROME		2"		1/2"		PROVIDE WITH PROFLO PFSASB01 30" CHROME SLIDE BAR FOR HAND SHOWER AND PROFLOW PFSAH01 SHOWER SYSTEMS." SHOWER SYSTEM WITH ASSE 1016 COMPLIANT TYPE "T/P" THERMOSTATIC/PRESSURE BALANCING COMBINATION VALVE WITH ADJUSTABLE STOP SCREW TO LIMIT HANDLE TURN. CONCEALED 3-PORT DIVERTER VALVE WITH LEVER HANDLE WITH ARM AND FLANGE, INTEGRAL STOPS, AND IN-LINE VACUUM BREAKER. H SHOWER SYSTEM WITH STANDARD HAND SHOWER, 60" FLEXIBLE METAL HOSE, AND 48" SLIDE BAR FOR HAND SHOWER MOUNTING. PROVIDE MANUFACTURER'S FLOW RATE RESTRICTOR ON SHOWERHEAD.
-1	HOT/COLD WATER SUPPLY & SANITARY OUTLET BOX	SIOUX CHIEF	696-2313MF 4	ABS PLASTIC	WHITE	2"		2"	1/2"		FULLY RECESSED WASHING MACHINE SUPPLY BOX WITH COVER. PROVIDE 1/4 TURN BALL VALVES AND WATER HAMMER ARRESTORS IN BOX. PROVIDE A 2" TRAPPED STANDPIPE IN CONCEALED WALL SPACE.
-2	COLD WATER OUTLET BOX	SIOUX CHIEF	696-G1010MF 2	ABS PLASTIC	WHITE				1/2"		FULLY RECESSED ICE MAKER SUPPLY BOX WITH COVER. PROVIDE 1/4 TURN BALL VALVE AND WATER HAMMER ARRESTOR IN BOX. PROVIDE A BACKFLOW PREVENTER CONCEALED IN WALL SPACE.
	WATER CLOSET - FLOOR MOUNT - FLUSH VALVE - ADA	SLOAN	WETS-2020.1401 6	WHITE VITREOUS CHINA	WHITE	4"		2"	1"		ST-2029 WATER CLOSET ELONGATED BOWL AND G2 8111 FLUSHOMETER, 1.28 GPF (4.8 LFP) FLUSH VOLUME. BATTERY POWERED INFRARED SENSOR, 3-SECOND FLUSH DELAY WITH "LOW BATTERY" FLASHING LED AND COURTESY FLUSH OVERRIDE BUTTON.

		1				1	
					WASTE		
ID	DESCRIPTION	MANUFACTURER	MODEL	QTY	PIPE SIZE	PIPE SIZE PIPE SIZE	SPECIFICATION
CO-1	2" Floor Cleanout with Type S Cover and EZ1™ Technology	Zurn Industries, LLC	Z1400-SZ1	1	2"	-	ZURN Z1400-BZ1 cleanout, Dura-Coated cast iron body with bottom outlet, with gas and water tight threaded ABS tapered plug, and top assembly. EZ1TM drainage series is engineered to simplify product installation and comprised of concrete shield to provide up to 1-1/4" [32] of vertical post pour adjustment, pre-packaged shims for tilt correction and integrated, self-contained "Type B" light duty scoriated cover with rough-in cover for protection during concrete pour. Cleanout is designed in accordance with ASME A112.36.2M
CO-3	4" Floor Cleanout with Type S Cover and EZ1™ Technology	Zurn Industries, LLC	Z1400-SZ1	4	4"		ZURN Z1400-BZ1 cleanout, Dura-Coated cast iron body with bottom outlet, with gas and water tight threaded ABS tapered plug, and top assembly. EZ1TM drainage series is engineered to simplify product installation and comprised of concrete shield to provide up to 1-1/4" [32] of vertical post pour adjustment, pre-packaged shims for tilt correction and integrated, self-contained "Type B" light duty scoriated cover with rough-in cover for protection during concrete pour. Cleanout is designed in accordance with ASME A112.36.2M
CO-4	6" Floor Cleanout with Type S Cover and EZ1™ Technology	Zurn Industries, LLC	Z1400-SZ1	2	6"		ZURN Z1400-BZ1 cleanout, Dura-Coated cast iron body with bottom outlet, with gas and water tight threaded ABS tapered plug, and top assembly. EZ1TM drainage series is engineered to simplify product installation and comprised of concrete shield to provide up to 1-1/4" [32] of vertical post pour adjustment, pre-packaged shims for tilt correction and integrated, self-contained "Type B" light duty scoriated cover with rough-in cover for protection during concrete pour. Cleanout is designed in accordance with ASME A112.36.2M
FD-1	2" Body Assembly with Type BZ1™ Leveling Strainer	Zurn Industries, LLC	Z415-BZ1	29	2"		Zurn Z415-B floor and shower drain, Dura-coated cast iron body with bottom outlet, combination invertible membrane clamp and adjustable collar with seepage slots and top assembly. EZ1TM drainage series is engineered to simplify product installation, comprised of concrete shield, up to 1-1/4" [32] of vertical post pour adjustment, pre-packaged shims for tilt correction and integrated, self-contained "Type B" light duty strainer with rough-in cover for protection during concrete pour.
FD-1-C	2" Body Assembly with Type BZ1™ Leveling Strainer	Zurn Industries, LLC	Z415-BZ1	2	2"		Zurn Z415-B floor and shower drain, Dura-coated cast iron body with bottom outlet, combination invertible membrane clamp and adjustable collar with seepage slots and top assembly. EZ1TM drainage series is engineered to simplify product installation, comprised of concrete shield, up to 1-1/4" [32] of vertical post pour adjustment, pre-packaged shims for tilt correction and integrated, self-contained "Type B" light duty strainer with rough-in cover for protection during concrete pour. Provide With Mechanically Fastened, Solid, Removable Cover.
FS-1	8" X 8" A.R.E. Sani-Flor Receptor 6" Sump Depth	Zurn Industries, LLC	Z1910	4	3"	2"	ZURN Z1910 Sani-Flor Receptor 8" x 8" x 6" [203mm x 203mm x 152mm] deep cast iron body and square, medium-duty grate with 7/16" [11mm] slotted openings, white acid resisting porcelain enamel interior and top, complete with white ABS anti-splash interior bottom dome strainer.
HI-1	53.5" X 29.5" X 32" Lint Interceptor with 4" Inlet/Outlet Connection	ASHLAND	APLI100-30	2	4"		Ashland Lint Interceptor with 3/16" Aluminum Diamond Tread Plate Cover. Provide neck extensions as required to adjust for required plumbing invert(s).
SD-1	48" Long Custom Fabricated Resinous Flooring Proline Drain Body.	Quickdrain USA	PLD36 - Drain Body 3	6 1	2"	1 1/2"	ProLine Drain Body, 18 Guage 316L Stainless Steel Custom Linear Floor Drain. Drain Body Can Be Any Size From 10" to 100". Internally Pitched channel Drain Body. 34" Maximum Horizontal Distance for Pitched Channel to Waste Outlet. 2" I.D. Schedule 10 Steel Down Spout Waste Outlet can be located at virtually any location.
TD-1	48" Long Linear Drain with 2" Center Drain Connection.	Zurn Industries, LLC	ZS880	101	2"		All Type 304 CF8 Fabricated Stainless Steel Linear Shower Drain. Complete with vertically adjustable anchoring support legs, anti-ponding V-shaped channel with 2" No-Hub center outlet, adjustable secured leveling frame with built-in tile edge, and secured, light-duty, slotted heel-proof grate. Drain is designed for installation in a minimum 2" concrete pour and can be adjusted to accommodate 1/4" and 3/8" finished tile thicknesses.
TD-2	60" Long Linear Drain with 2" Center Drain Connection.	Zurn Industries, LLC	ZS880	17	2"		All Type 304 CF8 Fabricated Stainless Steel Linear Shower Drain. Complete with vertically adjustable anchoring support legs, anti-ponding V-shaped channel with 2" No-Hub center outlet, adjustable secured leveling frame with built-in tile edge, and secured, light-duty, slotted heel-proof grate. Drain is designed for installation in a minimum 2" concrete pour and can be adjusted to accommodate 1/4" and 3/8" finished tile thicknesses.
TD-3	6-3/4" Wide Reveal Trench Drain System With Stainless Steel Extra Heavy-Duty Frame Assembly	Zurn Industries, LLC	Z886-HDS	3	4"		Channels are 80 [2032] long, 6-3/4 [171] wide reveal and have a 4 [102] throat. Modular channel sections are made of 0% water absorbent High Density Polyethylene (HDPE). Channels have a positive mechanical connection between channel sections that will not separate during the installation and mechanically lock into the concrete surround every 10 [254]. Channels weigh less than 2.31 lbs. [1.05kg] per linear foot, have a smooth, 1-1/2 [38] radiused self cleaning bottom with a Manning's coefficient of .009 and .75% or neutral 0% built in slope. Channels have rebar clips standard to secure trench in its final location. Channels provided with standard SBG grates that lock down to fram Zurn 5-3/8 [137] wide reveal Stainless Steel cast Bar Grate conforming to ASTM specification A351, Grade CF8 (type 304), cast grate is rated class E per the DIN EN1433 top load classification. Supplied in 20 [508] nominal lengths with 1/2 [13] wide slots, and 3/4 [19] bearing depth. Grate has an open area of 27.7 sq. in per ft. [58,617 sq. mm per meter]. The .105 [2.66] thick Heavy-Duty Stainless Steel Frame Assembly conforms to ASTM specification A-240 (type 304), with 10 – 4 [102] long concrete anchors per 80 [2032]. Grate lockdown bars are to be integral to the frame. All welds must be performed by a certified welder per ASTM standard AWS D1.6. Frames produced in the U.S.A.

					GAS-FIRED WAT	TER HEATER S	CHEDULE								
	LOCAT	ION				GAS-FIRED HEAT EXCHANGER GAS BURNER WATERSIDE			FRSIDE						
				, Turk		MAX TEMP	THERMAL	UNIT							
ID	Name	Number	MANUFACTURER	MODEL NO.	TYPE	INPUT	TYPE	VOL	RISE	EFF	WEIGHT	VOLT	FREQ	PH	REMARKS
WH-1	WATER/GAS	165	Bradford White Corporation	EF-100T-199-3N	COMMERCIAL GAS ULTRA HIGH EFFICIENCY WATER HEATER	199999 Btu/h	NATURAL GAS	100.0 gal	140 °F	99%	900 lb	115 V	60 Hz	1	

NOTE - CONTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING AN A.S.M.E. RATING IF THE FOLLOWING CRITERIA ARE MET FOR SAID WATER HEATER:

1. HEAT INPUT OF 200,000 BTU/HOUR OR GREATER

2. WATER TEMPERATURE OF 210 DEGREES FAHRENHEIT OR GREATER

3. NOMINAL WATER CAPACITY OF 120 GALLONS OR GREATER

						DOMESTI	C CIRCU	LATING	PUMP S	CHEDULE				
	LOCATION				PUMP		MOTOR		SHIPPED					
ID	ID Name Number MANUFACTURER		MANUFACTURER	MODEL NO.	TYPE	DESIGN FLOW	HEAD	POWER	RPM	WEIGHT	VOLT	FREQ	PH	REMARKS
WHP-1	WATER/GAS	165	Taco	008IQSF6-IFC	SmartPlus HOT WATER RECIRCULATOR	13.0 GPM	14.5 FT	0.04 hp	3250	8 lb	115 V	60 Hz	3	

					GAR	RBAGE [OISPO	SAL SCHEDULE
ID	MANUFACTURER	MODEL NO.	MOTOR POWER	SHIPPED WEIGHT	VOLT	FREQ	PH	REMARKS
GD-1	Insinkerator	LC-50	0.50 hp	35 lb	120 V	60 Hz	1	HARDWIRED GARBAGE DISPOSAL
Grand total: 5								



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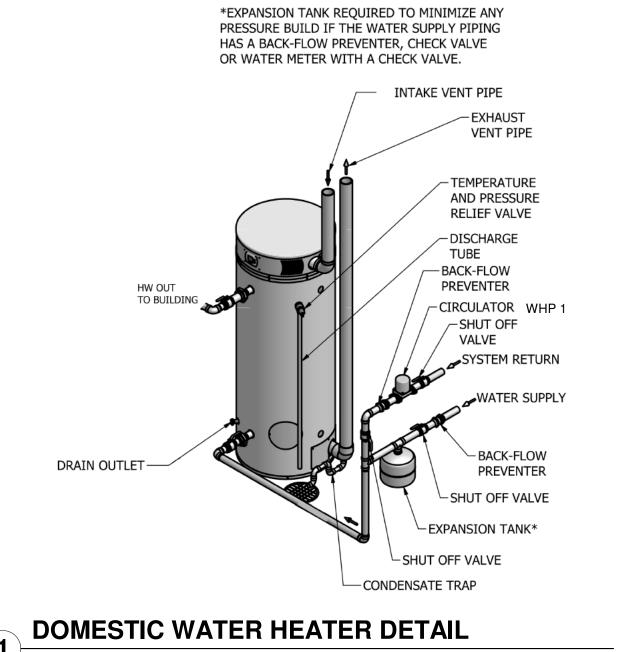


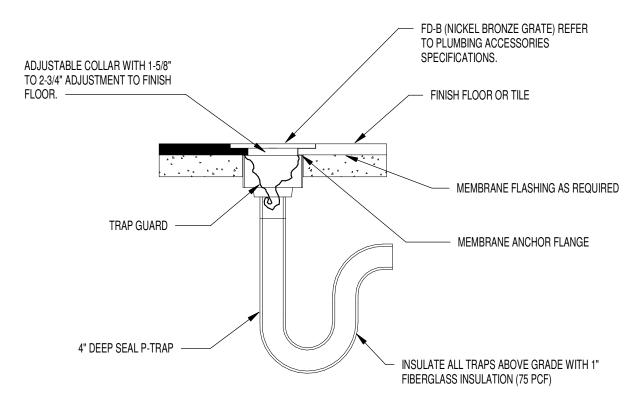
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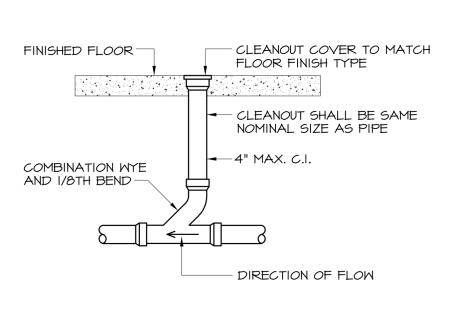
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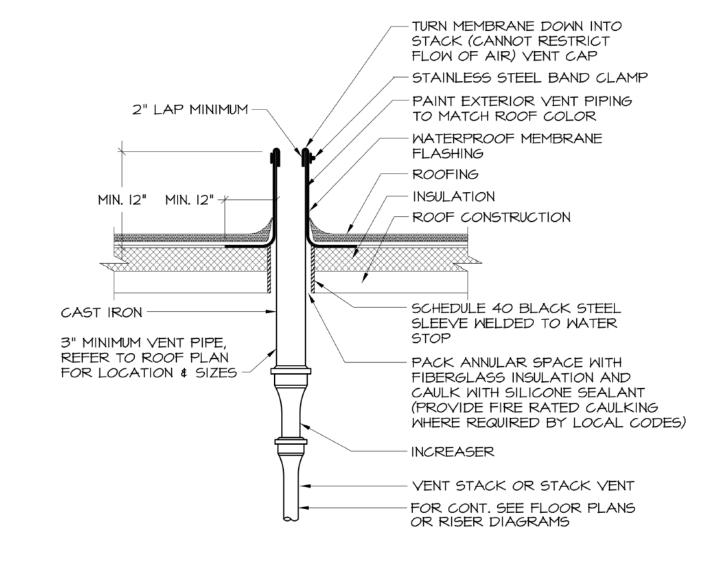
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DRAWING TITLE:
PLUMBING SCHEDULES





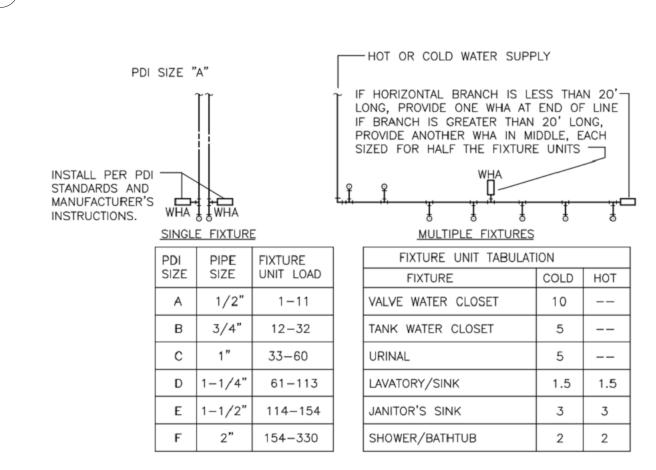




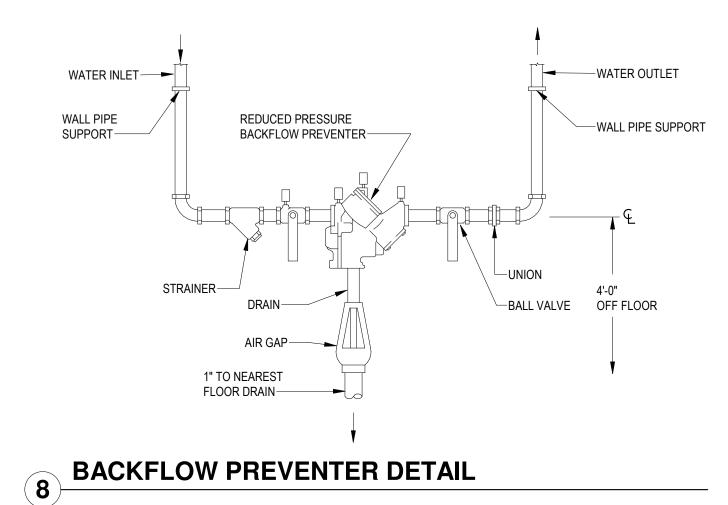


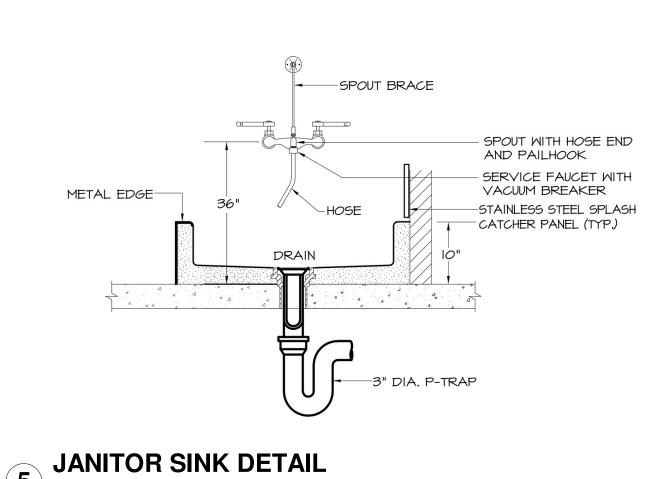


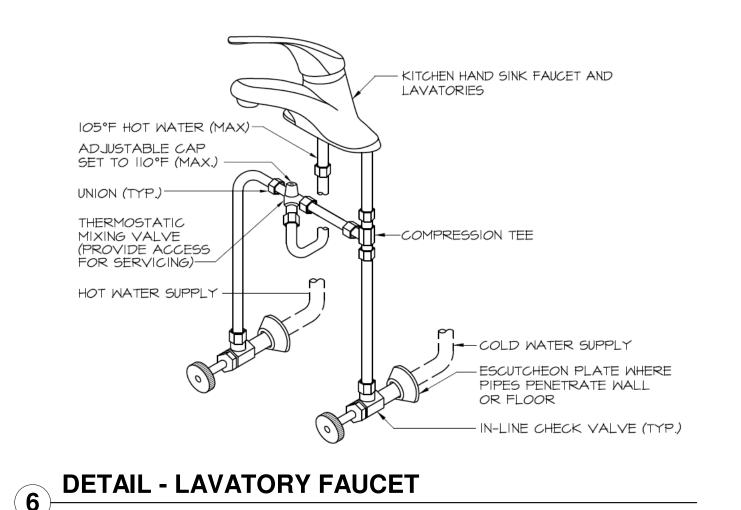




WATER HAMMER ARRESTERS BY SIOUX CHIEF, PRECISION PLUMBING PRODUCTS, WATTS OR APPROVED EQUIVALENT WITH PISTON AND 0-RING CONSTRUCTION, HAVING PDI #WH-201, ASSE #1010 AND ANSI # A112.26.1M CERTIFICATION. INSTALL IN LINE WITH OR VERTICAL POSITION, BUT NEVER UPSIDE DOWN. SIZE THE UNITS PER THE TABLES SHOWN ABOVE.







REFER TO INSTALLATION PROCEDURE AND INSTALLATION CHECKLIST.
 PROCEPTOR SEPARATORS MUST BE INSTALLED IN ACCORDANCE WITH ALL RELEVANT FEDERAL, PROVINCIAL/STATE, AND LOCAL CODES INCLUDING LOCAL PLUMBING CODE.
 US PATENT # 5,746,912; CDN PATENT # 2,195,822

TABLE 2

GMC/OMC/SMC 250 44" 230 lbs

GMC/OMC/SMC 300 52" 255 lbs

ANTI-BUOYANCY SLAB DIMENSIONS

—CAST-IN-PLACE ANTI-BUOYANCY SLAB FOR HIGH WATER TABLE CONDITIONS 3000 psi CONCRETE READY MIX. POUR AROUND BASE OF UNIT (16 CU FT MINIMUM - BASED ON CONCRETE DENSITY OF 130 LBS / CU FT DENSITY)

GMC/OMC/SMC 100

GMC/OMC/SMC 200 36"

GMC/OMC/SMC 150

INLET INVERT TO TANK

BOTTOM (H*)

WEIGHT OF TANK

by greenturtle

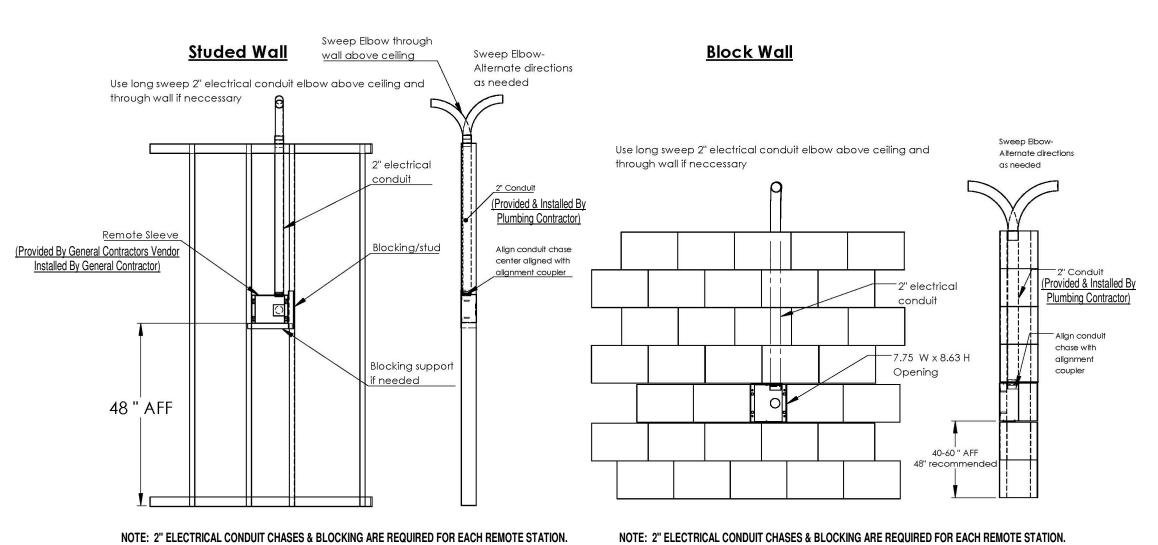
US 877 428 8187 CAN 877 966 9444

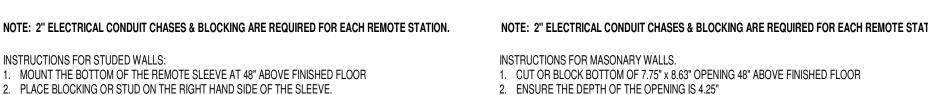
→ www.greenturtletech.com

SCALE:1:35 DO NOT SCALE DRAWING SHEET I

A INSTALL GMC/OMC 50-300







- 2. ENSURE THE DEPTH OF THE OPENING IS 4.25" ENSURE SLEEVE IS LEVEL AND MOUNTED FLUSH WITH FRONT OF THE STUDS. SECURE 3. ENSURE THE COUPLER IS ALL THE WAY BACK IN THE TOP OF SLEEVES AS POSSIBLE. INSERT SLEEVE TO THE STUDS OR BLOCKING ON BOTH SIDES USING SCREWS ON THE INSIDE OF SLEEVE IN OPENING AND ENSURE THE SLEEVE IS MOUNTED LEVEL AND FLUSH WITH FRONT OF SLEEVE THROUGH THE SLOTTED HOLES 4. PLACE BLOCKING ON THE LOWER SIDE OF SLEEVE FOR ADDITIONAL SUPPORT IF NEEDED. 4. ALIGN A 2" CONDUIT CHASE ABOVE THE COUPLER. ROUTE THE CONDUIT CHASE UP OR DOWN THROUGH THE TOP OF THE MASONARY WALL ABOVE THE CEILING.
- 5. ENSURE THE COUPLER IS FORWARD IN THE TOP OF SLEEVES AS POSSIBLE AND ALIGN A 2 CONDUIT CHASE ABOVE THE COUPLER. ROUTE THE CONDUIT CHASE THROUGH THE TOP OF 5. ATTACH A LONG 2" SWEEP ELECTRICAL CONDUIT ELBOW ABOVE THE CILING ATO THE CONDUIT THE STUDED WALL ABOVE THE CEILING CHASE AND THROUGH WALL IF NECCESSARY. 6. ATTACH A LONG 2" SWEEP ELECTRICAL CONDUIT ELBOW ABOVE THE CEILING TO THE CONDUIT CHASE AND THROUGH WALL IF NECCESSARY.



GMC/OMC/SMC 50, 100, 150, 200, 250, 300 INSTALLATION DRAWING

LENGTH 62" WIDTH 32"

MIN. 6" PEA GRAVEL BED (OR APPROVED BACKFILL

COMPACTED TO 98% SPD)

"B" SEE TABLE 1 COLLAR (EC2) HEIGHT TRIMMABLE ON SITE.

IF OVER 6 FT

REQUIRES FACTORY REINFORCEMENT

 \longrightarrow INLET

PEA GRAVEL TO
3 FT. HORIZONTALLY
ALL AROUND TANK
(OR APPROVED

EQUIVALENT COMPACTED

TO 98% SPD)

TABLE 1

Max. 6 FT.

18"

12"

TO FIT VENT ELBOWS UNDER FLOOR

** ESTIMATED MINIMUM SPACE REQUIRED

Min.with 18"

* ACTUAL

MAY VARY

BURIAL DEPTH

Traffic

Traffic**

Min. no

HEIGHT

IF VEHICLE TRAFFIC LOADING CONDITIONS EXIST USE REINFORCED CONCRETE RELIEVING SLAB DESIGNED BY ENGINEER

Ø 24" FRAME AND COVER SECURED IN CONCRETE

-CONNECT TANK TOP VENTS

SEE ALSO NOTE 2)

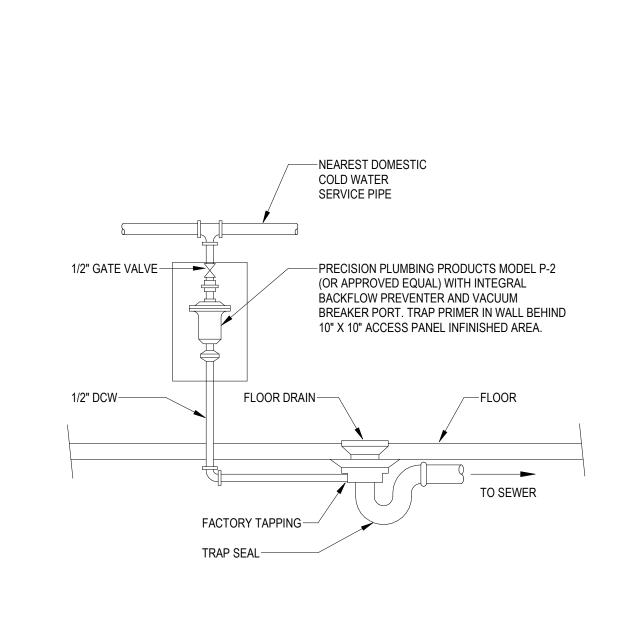
9" ALL AROUND TANK

FOR GMC/OMC/SMC MODELS 50-300 2 SEPTEMBER 13, 2007 L. SIMKINS

12" MINIMUM

ALL DIMENSIONS IN INCHES

QUTLET ──



TRAP PRIMER DETAIL



PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019 DRAWING TITLE: PLUMBING DETAILS SHEET NUMBER: P601

DESCRIPTION DATE

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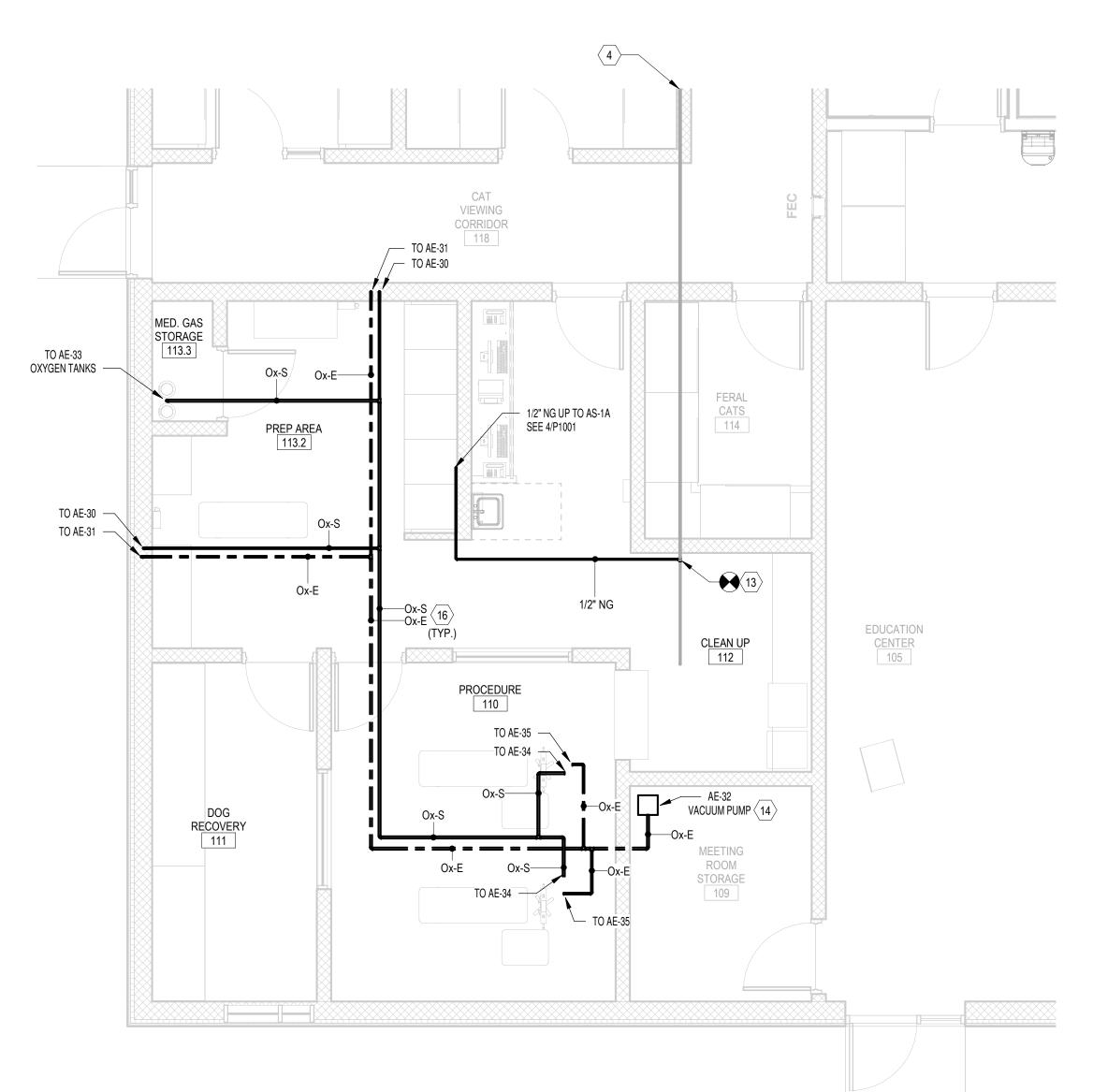
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ALTERNATE 004: SPAY/NEUTER CLINIC - SANITARY / VENT PLAN

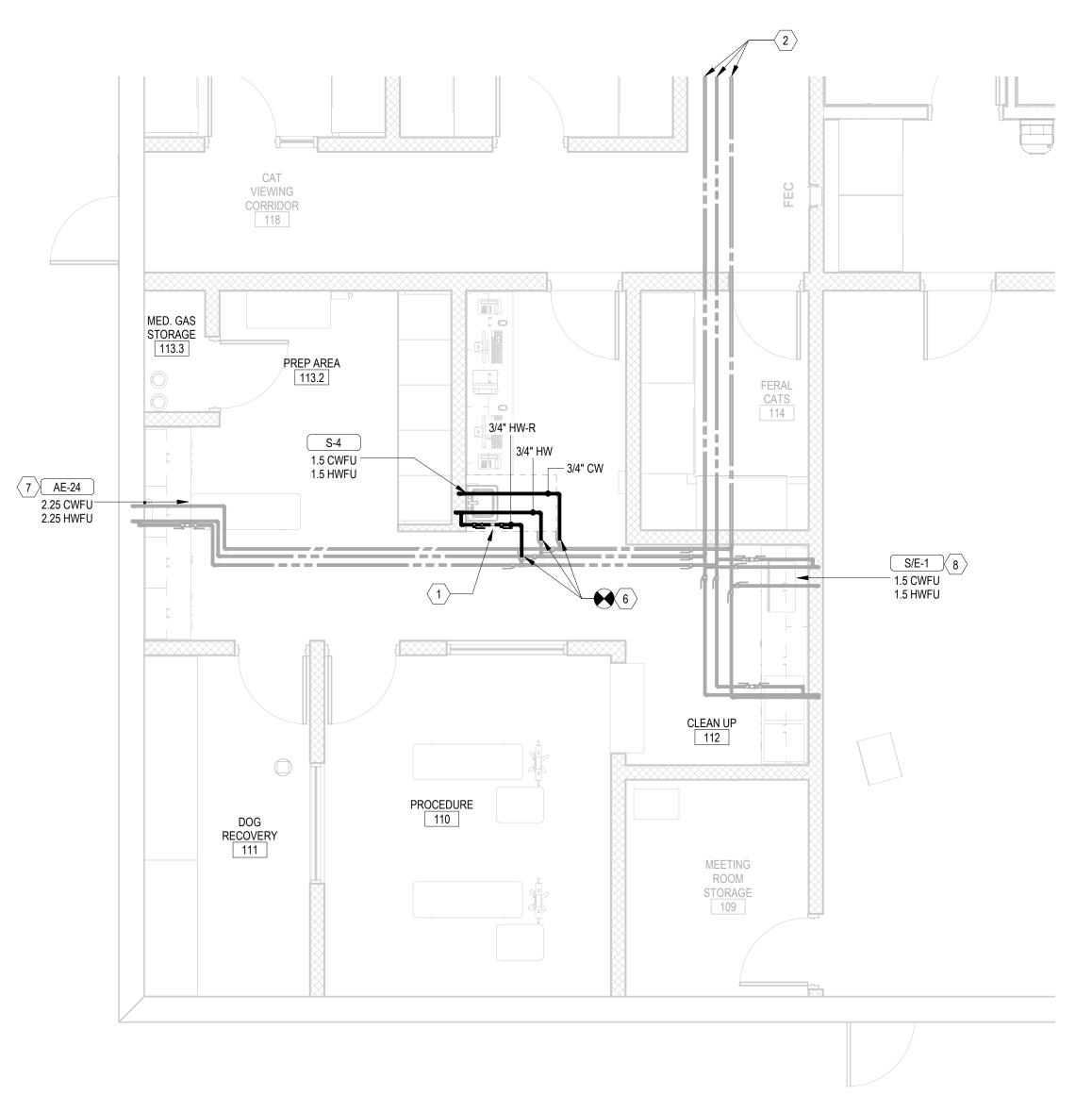
1/4" = 1'-0"



3 ALTERNATE 004: SPAY/NEUTER CLINIC - NATURAL/MEDICAL GAS PLAN

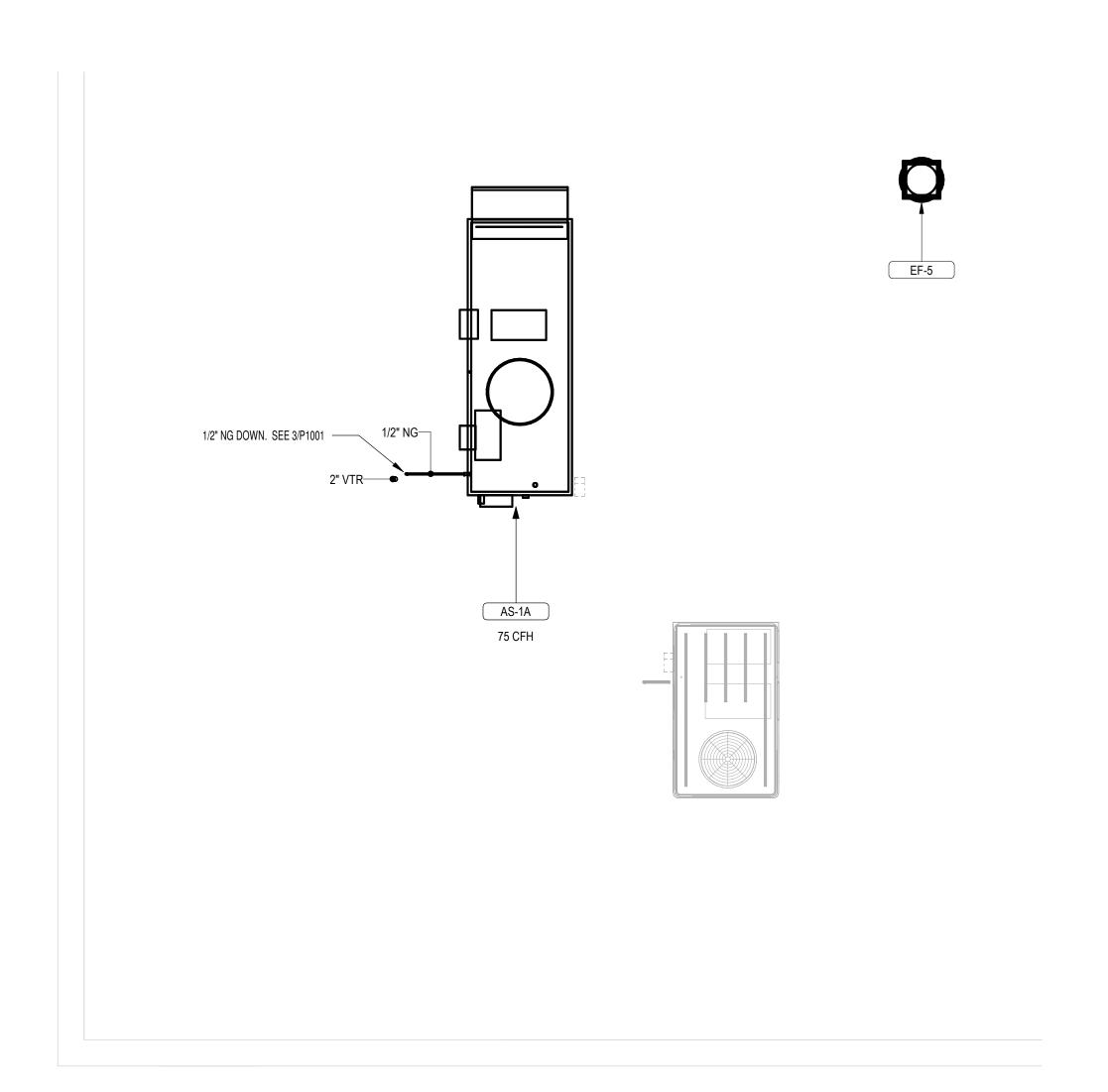
1/4" = 1'-0"

MANNS WOODWARD STUDIOS.



ALTERNATE 004: SPAY/NEUTER CLINIC - DOMESTIC WATER NEW WORK PLAN

1/4" = 1'-0"



ALTERNATE 004: SPAY/NEUTER CLINIC - ROOFTOP NEW WORK PLAN

1/4" = 1'-0"



- PROVIDE THERMOSTATIC BALANCING VALVE MANUFACTURED BY CIRCUITSOLVER, MODEL CS-3/4-100 ON HOT WATER RETURN PIPE AT INDICATED LOCATION ON
- 2 SEE P102 FOR CONTINUATION
- 3 SEE P101 FOR CONTINUATION
- 4 SEE P103 FOR CONTINUATION 6 CONNECT 3/4" COLD WATER, 3/4" HOT WATER, AND 3/4" HOT WATER RETURN PIPING
- TO DOMESTIC WATER PIPING IN CEILING. 7 CONNECT DOMESTIC HOT AND COLD WATER PIPING FROM WALL TO WET TABLE. 8 CONNECT DOMESTIC HOT AND COLD WATER PIPING FROM WALL TO SINK.
- 10 CONNECT 2" SANITARY WASTE FROM SINK TO 2" SANITARY WASTE CONNECTION AT FLOOR. CONNECT 1 1/2" SANITARY VENT TO 2" SANITARY VENT ABOVE CEILING.
- 11 CONNECT 2" SANITARY WASTE FROM SINK TO 2" SANITARY WASTE CONNECTION AT
- 12 CONNECT 2" SANITARY WASTE FROM WET TABLE TO 2" SANITARY WASTE CONNECTION AT WALL.
- 13 CONNECT 1/2" NG TO 3/4" NG ABOVE CEILING. 14 INSTALL VACUUM PUMP PER MANUFACTURER RECOMMENDATIONS.
- 15 3/4" VENT PIPING FROM VACUUM PUMP SHALL BE COPPER "L" TUBING & FITTINGS.
- 16 OXYGEN SUPPLY AND EXHAUST PIPING SHOWN ON DRAWINGS SHALL BE SIZED AND INSTALLED BY CONTRACTORS VENDOR.

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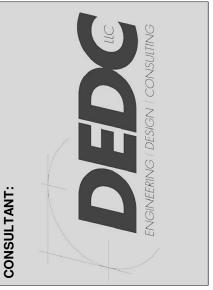
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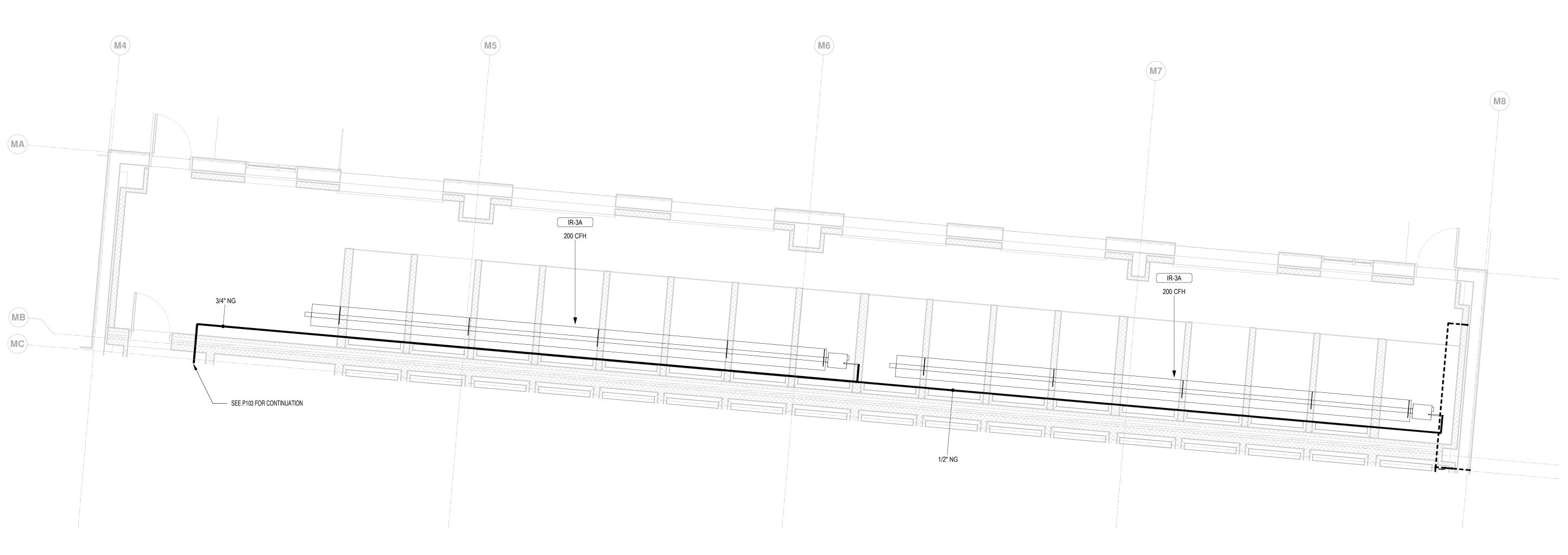
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DRAWING TITLE: ALTERNATE 004 -SPAY/NEUTER CLINIC SHEET NUMBER:

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ALTERNATE 006: OUTDOOR DOG RUN HEATERS - NATURAL GAS PLAN

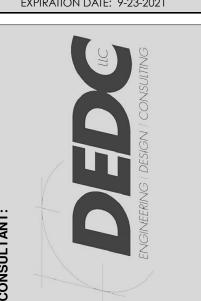
1/4" = 1'-0"

	ALTERNATE 006 - 0	GAS FIR	ED RA	DIANTI	HEATE	R SCH	EDU	LE - OUTC	OOR	DOG RUN
					GAS			ELECTRICAL		
Identity					Minimum Inle	et Maximum Inle		Number		
Mark Count	Description	Manufacturer	Model	Heating Input	Pressure	Pressure	Voltage	of Poles Frequency	Full Load Amps	Type Comments
IR-3A 2 Vant	ntage Premium Harsh Environment Gas Fired Heater with High Efficiency Reflectors	Roberts Gordon®	HEV-125	125000 Btu/h	4.60 in-wg	14.00 in-wg	120 V	1 60 Hz		USE ZERO BOUNCE BACK,12 SURFACE, PARABOLIC REFLECTORS RATED AT EF-15 AS TESTED BY AHRI 1330 STANDARD. PROVIDE NEMA 4X MOISTURE RESISTANT LINE
										VOLTAGE THERMOSTAT. REFLECTORS SHALL BE ANGLED AT 45 DEGREES INTO SPACE.

INCLUDE COMPLETE SYSTEM, BURNER/PUMPS/CONTROL PANEL MOUNTING HARDWARE
 TUBING SHALL BE HEAT TREATED ALUMINIZED OR HOT ROLLED STEEL AS INDICATED ON PLAN DRAWINGS.
 ALL BURNERS SHALL HAVE COMBUSTION INTAKE FILTERS.
 PROVIDE 120V, 20 AMP SYSTEM CONTROL PANEL, MANUFACTURER MODEL #0277002 AND RECOMMENDED 24-VOLT THERMOSTATS.

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LICENSE NUMBER: #47259
EXPIRATION DATE: 9-23-2021



CHARLES COUNTY ANIMAL CARE CENTER
5690 PINEY CHURCH ROAD
WALDORF, MARYLAND 20602

NO. DESCRIPTION DATE

PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE: ALTERNATE 006-OUTDOOR DOG RUN HEATERS
SHEET NUMBER:

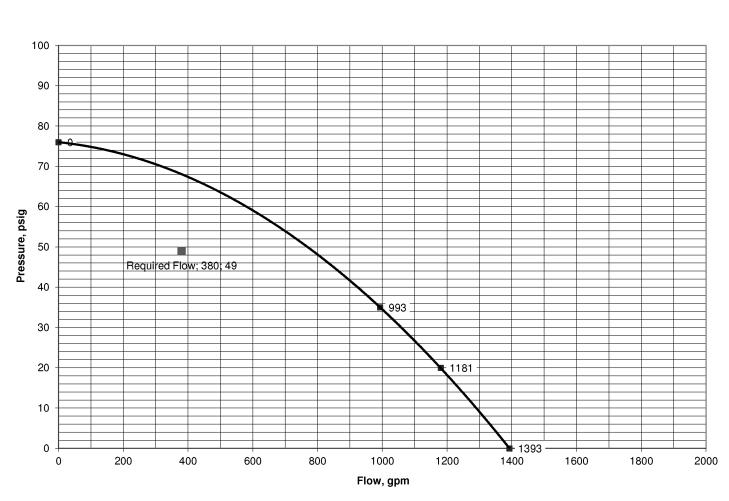


Test Made By: D. Butter Purpose or Project: RESIDUAL HYDRANT: Street Location: Pracy Church Rd and St Linus Dr Test Designation#_____ Type of Hydrant: 2007 Mucle Nozzle Size: 🔭 Nozzle Type: _____ Coefficient: _____ Static Pressure Reading: 76 psi Residual Pressure Reading: 35 FLOW HYDRANT: Street Location: Pincy Church Rd and St Linus Dr Test Designation#_____ Type of Hydrant: 2007 Muclier Nozzle Size: 🔎 Nozzle Type: _____ Coefficient: _____ Actual Flow from Hydrant: ______998 Are any pumps/wells operating nearby (circle one) YES NO

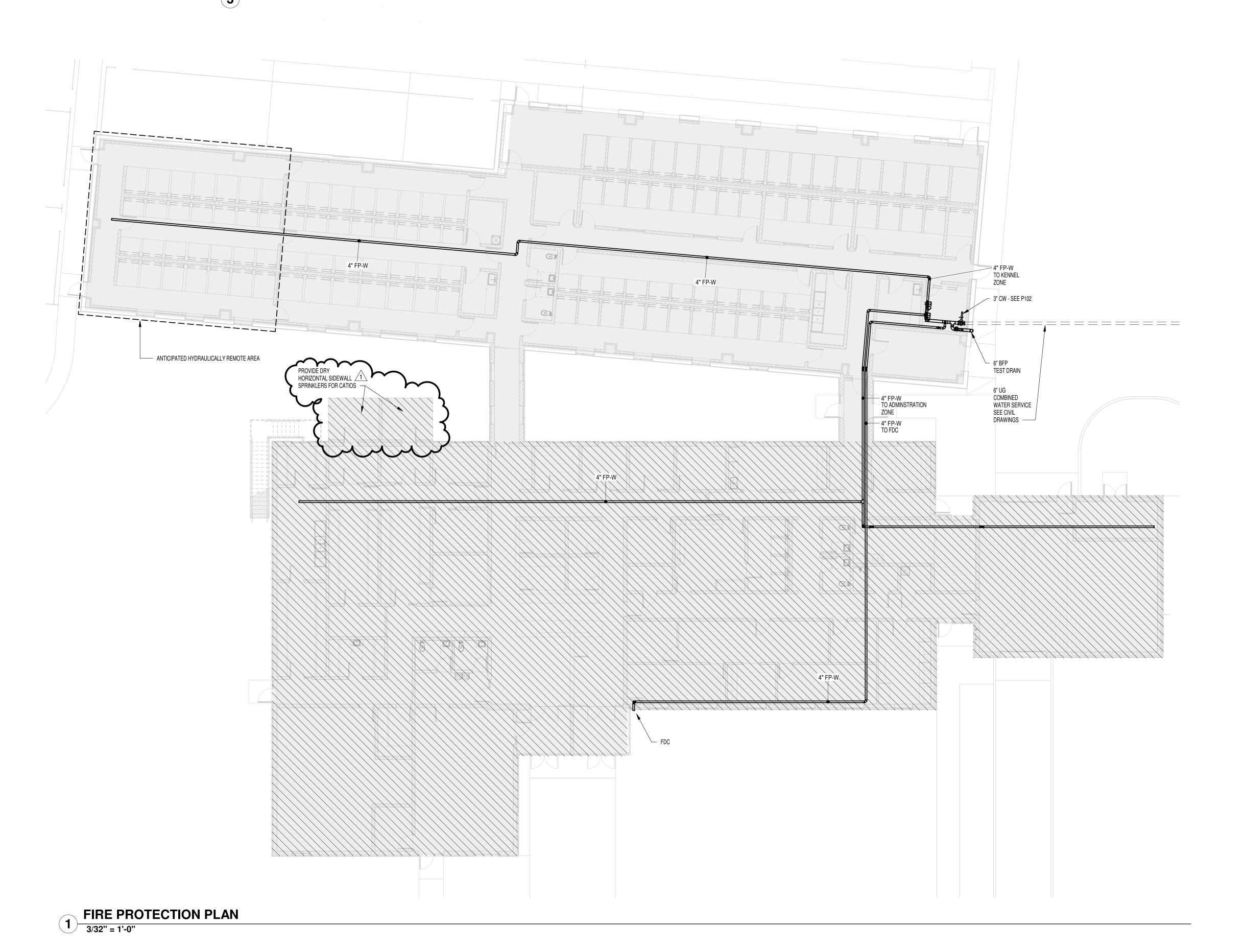
PROVIDE NOTES, COMMENTS, REMARKS, AND SKETCH ON BACK OF SHEET

<u>FIRE SPRINKLER ROUGH PRI</u>	ESSURE BUDGET	
DESIGN CRITERIA		
HAZARD CLASS DESIGN DENSITY	Light Hazard	0.1 GPM/SF
DESIGN AREA		1500 SF
QUICK RESPONSE SPRINKLERS? If so, enter Design Area		
percent reduction from NFPA 13 Fig 11.2.3.2.3.1		0 % reduction
INSIDE/OUTSIDE HOSE ALLOWANCE ADDITIONAL FLOW		100 GPM 100 GPM
7.65THOWLETEON		100 01 11
SYSTEM INFORMATION		
MAX. AREA / SPRINKLER HEAD (NFPA-13 8.6.2.2)		130 SF
# SPRINKLERS IN DESIGN AREA		12
FLOW ESTIMATE AVERAGE FLOW / SPRINKLER		15 GPM
TOTAL SPRINKLER FLOW		180 GPM
TOTAL REQUIRED FLOW		380 GPM
PRESSURE ESTIMATE		
SPRINKLER K FACTOR		5.6
REQ'D ORIFICE PRESSURE		8 PSI
WHOLE BLDG SPRINKLER SYSTEM DEMAND		
REQ'D ORIFICE PRESSURE		8 PSI
ELEVATION OF HIGHEST SPRINKLER ABOVE SUPPLY		25 FT
BACKFLOW PREVENTER PRESSURE DROP		10 PSI
PIPING LOSS FROM HYDRANT TO BLDG: TTL FLOW THRU 6" MAIN FOR ~1000FT		16.8 FT
PIPING LOSS FROM MAIN TO HEADS: 250FT MAIN 4" PIPE @180GPM		4.75 FT
₩ 160GFIVI		4.75 FT
PIPING LOSS FROM MAIN TO HEADS: 50FT 2"BRANCH		
@25GPM		1.5 FT
SAFETY FACTOR		10 PSI
TOTAL REQUIRED PRESSURE		49 PSI

WATER FLOW TEST CHART



FIRE PROTECTION PRELIMINARY CALCULATIONS



FIRE PROTECTION GENERAL NOTES

- THIS CONTRACTOR SHALL COORDINATE PHASING OF SPRINKLER WORK WITH THE GENERAL CONTRACTOR PRIOR TO
 - PROVIDE A COMPLETE WET TYPE FIRE PROTECTION SYSTEM AS REQUIRED TO ACCOMMODATE THE FLOOR PLAN AND CEILING TYPES INCLUDING MAINS, BRANCHES, HEADS, VALVES, AND ACCESSORIES AS REQUIRED. THE SYSTEM SHALL BE INSTALLED ACCORDING TO MANUFACTURER'S SPECIFICATIONS AND RECOMMENDATIONS OF THE STATE BUILDING CODE, LOCAL FIRE DEPARTMENT, AND ALL FEDERAL, STATE, AND LOCAL AUTHORITIES, NFPA, AND
- FACTORY MUTUAL. THE SPRINKLER SYSTEM SHALL BE DESIGNED BASED UPON ACTUAL WATER FLOW TEST DATA OBTAINED AT OR NEAR
- REFER TO REFLECTED CEILING PLANS FOR ADDITIONAL INFORMATION REGARDING SPRINKLER HEAD LOCATION AND PIPE, UNLESS NOTED OTHERWISE.
- DIVISION 21 CONTRACTOR SHALL COORDINATE WITH THE ELECTRICAL CONTRACTOR FOR PROPER INSTALLATION OF THE FIRE PROTECTION SYSTEMS ALARM DEVICES INVOLVED WITH FIRE SPRINKLER SYSTEM. ALL SPRINKLER SYSTEM PIPING SHALL BE CONCEALED ABOVE THE SUSPENDED CEILING SYSTEM, UNLESS NOTED OTHERWISE. WRITTEN AUTHORIZATION SHALL BE OBTAINED FROM THE ARCHITECT PRIOR TO EXPOSING ANY PIPING
- IN ANY ROOM WHICH HAS A SUSPENDED CEILING. THIS CONTRACTOR SHALL PROVIDE ALL ADDITIONAL SPRINKLER HEADS AS REQUIRED TO ENSURE AN APPROVED FIRE PROTECTION SYSTEM AT NO ADDITIONAL COST TO THE OWNER.
- AUXILIARY DRAINS SHALL BE EXPOSED WITH 1" DRAIN VALVES. WHEN 5 OR MORE GALLONS ARE TRAPPED, THIS CONTRACTOR SHALL PROVIDE FIXED PIPING TO AN ADEQUATELY SIZED RECEPTOR WHICH IS CAPABLE OF ACCEPTING THE FULL FLOW OF THE DRAIN. WHEN LESS THAN 5 GALLONS ARE TRAPPED, A HOSE BIB SHALL BE PROVIDED AT THE DRAIN VALVE.
- AUXILIARY DRAINS SHALL NOT BE LOCATED ABOVE PLASTER OR GYPSUM BOARD CEILING SYSTEMS. ONLY BY A SPECIFIC WRITTEN INSTRUCTION FROM THE ENGINEER WILL A VARIANCE BE PROVIDED. AN INSPECTOR'S TEST CONNECTION SHALL BE PROVIDED FOR EACH FIRE SPRINKLER ZONE. THIS CONTRACTOR
- SHALL PROVIDE FIXED PIPING FROM THE TEST CONNECTION TO AN ADEQUATELY SIZED RECEPTOR WHICH IS CAPABLE OF ACCEPTING THE FULL FLOW OF THE TEST. EXTERIOR DISCHARGE OF THE TEST CONNECTION SHALL BE PERMITTED ONLY BY SPECIFIC WRITTEN INSTRUCTION FROM THE ENGINEER. SHOW ALL ROOM NUMBERS ON SHOP DRAWING PLANS.
- ROUTE SPRINKLER PIPING SUCH THAT IT DOES NOT RUN ABOVE ELECTRICAL PANELS, SWITCHGEAR, OR SIMILAR EQUIPMENT. SPRINKLER MAINS SHALL NOT RUN THROUGH ELECTRICAL OR COMMUNICATION ROOMS. SPRINKLER
- HEADS IN THESE ROOMS SHALL BE SERVED BY A DEDICATED BRANCH LINE FOR EACH ROOM. THIS DRAWING INDICATES A GENERAL PIPING ARRANGEMENT AND SUGGESTED SIZING ONLY. THIS CONTRACTOR SHALL DETERMINE THE ACTUAL PIPE SIZING REQUIRED AND COORDINATE WORK WITH ALL OTHER TRADES TO AVOID
- THIS CONTRACTOR SHALL PREPARE HYDRAULIC CALCULATIONS BASED UPON THE CONFIGURATION OF THE ACTUAL SYSTEM DESIGN AS SHOWN ON THIS CONTRACTOR'S SHOP DRAWINGS.

GENERAL NOTES:

THE BUILDING SHALL BE PROTECTED THROUGHOUT WITH A HYDRAULICALLY CALCULATED WET AUTOMATIC FIRE SPRINKLER SYSTEM; FABRICATED AND INSTALLED IN STRICT ACCORDANCE WITH THE CODES AS STATED

MD BUILDING CODE: IBC 2015 WITH AMENDMENTS

NFPA 13 - STANDARD FOR THE INSTALLATION OF SPRINKLER SYSTEMS

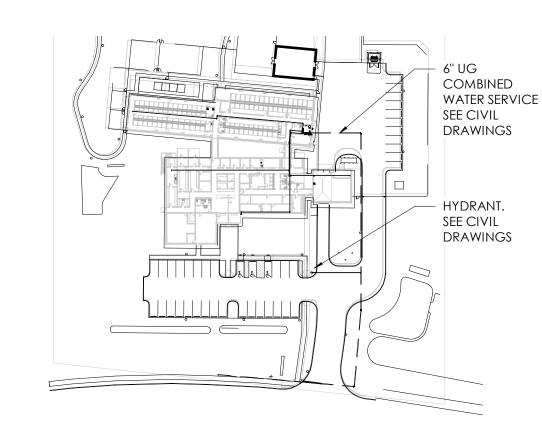
NFPA 24 - STANDARD FOR THE INSTALLATION OF PRIVATE FIRE SERVICE MAINS AND THEIR APPURTANCES NFPA 25 - STANDARD FOR THE INSPECTION, TESTING AND MAINTANCE OF WATER-BASED FIRE PROTECTION

NFPA 70 - NATIONAL ELECTRICAL CODE

NFPA 72 - NATIONAL FIRE ALARM CODE

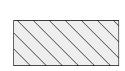
UL FIRE PROTECTION LIST - LATEST EDITION

FM GLOBAL PROPERTY LOSS PREVENTION DATA SHEETS - LATEST EDITION FM GLOBAL APPROVAL GUIDE - LATEST EDITION



PIRE PROTECTION SITE PLAN 1" = 100'-0"

LEGEND:



FIRE PROTECTION ADMINISTRATION SPRINKLER ZONE OCCUPANCY: LIGHT HAZARD DESIGN DENSITY: 0.10 GPM/SF DESIGN AREA: 1500 SF



FIRE PROTECTION KENNEL SPRINKLER ZONE OCCUPANCY: LIGHT HAZARD DESIGN DENSITY: 0.10 GPM/SF DESIGN AREA: 1500 SF

> 12/23/2019 DRAWING TITLE: FIRE PROTECTION PLAN F101

DESCRIPTION

Permit Response

PROJECT NUMBER:

18-034

PERMIT

PROJECT SET:

DATE ISSUED:

CARE

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(F) 443-403-2460

(E) INFO@MWSARCH.COM

I HEREBY CERTIFY THAT THESE

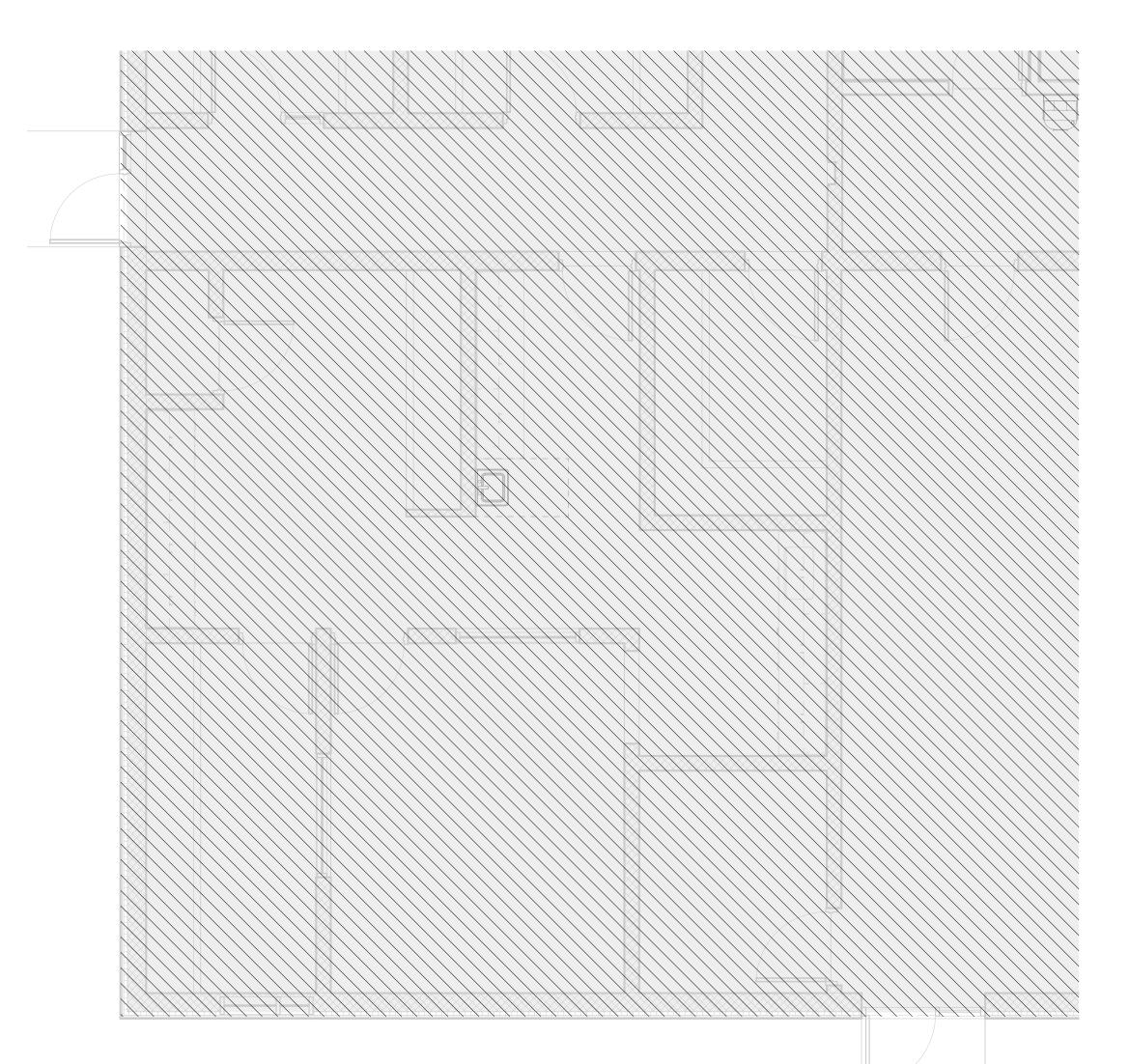
DOCUMENTS WERE PREPARED OR APPROVED BY ME, SCOTT A. FRENCK, PE

AND THAT I AM A DULY LICENSED

PROFESSIONAL ENGINEER UNDER THE

LAWS OF THE STATE OF MARYLAND. LICENSE NUMBER: #47259 EXPIRATION DATE: 9-23-2021

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ALTERNATE 004: SPAY/NEUTER CLINIC - FIRE PROTECTION PLAN

1/4" = 1'-0"

GENERAL NOTES:

THE BUILDING SHALL BE PROTECTED THROUGHOUT WITH A HYDRAULICALLY CALCULATED WET AUTOMATIC FIRE SPRINKLER SYSTEM; FABRICATED AND INSTALLED IN STRICT ACCORDANCE WITH THE CODES AS STATED

MD BUILDING CODE: IBC 2015 WITH AMENDMENTS

NFPA 13 - STANDARD FOR THE INSTALLATION OF SPRINKLER SYSTEMS NFPA 24 - STANDARD FOR THE INSTALLATION OF PRIVATE FIRE SERVICE MAINS AND THEIR APPURTANCES NFPA 25 - STANDARD FOR THE INSPECTION, TESTING AND MAINTANCE OF WATER-BASED FIRE PROTECTION

NFPA 70 - NATIONAL ELECTRICAL CODE

NFPA 72 - NATIONAL FIRE ALARM CODE

UL FIRE PROTECTION LIST - LATEST EDITION FM GLOBAL PROPERTY LOSS PREVENTION DATA SHEETS - LATEST EDITION

FM GLOBAL APPROVAL GUIDE - LATEST EDITION



10839-D PHILADELPHIA RD WHITE MARSH, MD 21162

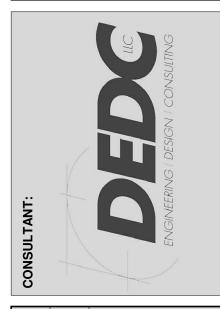
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I HEREBY CERTIFY THAT THESE DOCUMENTS WERE PREPARED OR APPROVED BY ME, SCOTT A. FRENCK, PE, AND THAT I AM A DULY LICENSED PROFESSIONAL ENGINEER UNDER THE LAWS OF THE STATE OF MARYLAND. LICENSE NUMBER: #47259 EXPIRATION DATE: 9-23-2021



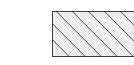
CHARLES COUNTY
CHARLES COUNTY ANIMAL CARE CENTER
5690 PINEY CHURCH ROAD
WALDORF, MARYLAND 20602

NO. DESCRIPTION DATE

PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED:

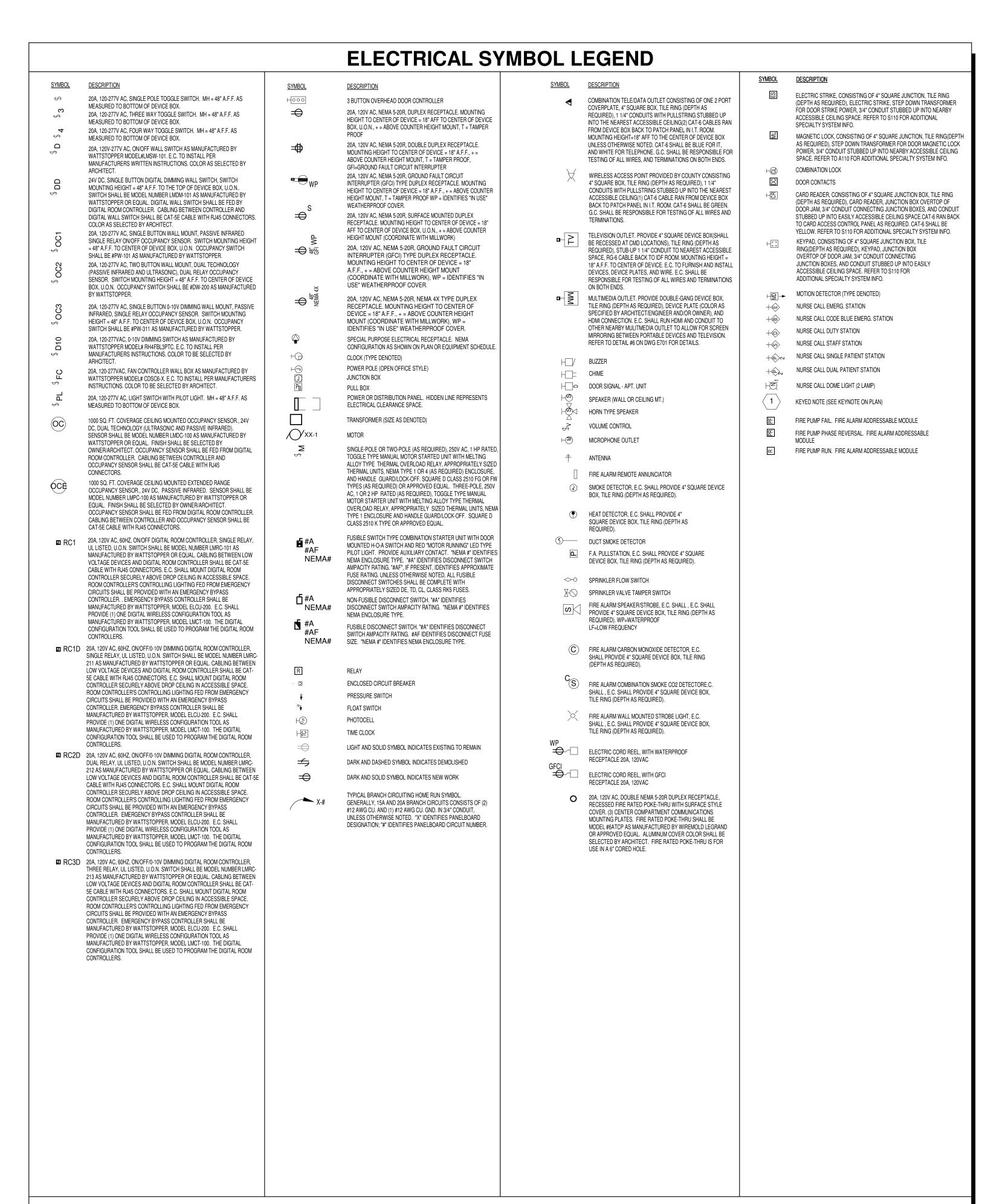
12/23/2019 DRAWING TITLE: ALTERNATE 004 -SPAY/NEUTER CLINIC

SHEET NUMBER:



FIRE PROTECTION ADMINISTRATION SPRINKLER ZONE OCCUPANCY: LIGHT HAZARD DESIGN DENSITY: 0.10 GPM/SF DESIGN AREA: 1500 SF

FIRE PROTECTION KENNEL SPRINKLER ZONE OCCUPANCY: LIGHT HAZARD DESIGN DENSITY: 0.10 GPM/SF DESIGN AREA: 1500 SF



	ELECTRICAL ABBREVIATIONS LIST											
		1 POLE (2P, 3P, 4P, ETC.) AMPERE	DCP DEPT	DOMESTIC WATER CIRCULATING PUMI DEPARTMENT	PHT HTG	HEIGHT HEATING	NEMA	NATIONAL ELECTRICAL MANUFACTURER'S	SWBD SYM	SWITCHBOARD SYMMETRICAL		
		ABOVE COUNTER OR AIR		DETAIL	HTR	HEATER	ASSOCIA		SYS	SYSTEM		
	CONDITION			DIAMETER	HV	HIGH VOLTAGE		NON-FUSED SAFETY	TEL	TELEPHONE		
		ABOVE CEILING	DISC	DISCONNECT	HVAC	HEATING, VENTILATING AND	20	DISCONNECT SWITCH	TERM	TERMINAL		
		AUTOMATIC DOOR OPENER	DIST	DISTRIBUTION		AIR CONDITIONING	NIC	NOT IN CONTRACT	TL	TWIST LOCK		
		AMP FRAME		DOWN	HWP	HYDRONIC WATER PUMP	NL	NIGHT LIGHT	TR	TAMPER RESISTANT		
		ABOVE FINISHED FLOOR		DAMPER	IC	INTERRUPTING CAPACITY	N.O.	NORMALLY OPEN		THERMOSTAT		
		ABOVE FINISHED GRADE		SAFETY DISCONNECT SWITCH	IG	ISOLATED GROUND	NPF	NORMAL POWER FACTOR	TTC	TELEPHONE TERMINAL CABINET		
		ARC FAULT CIRCUIT INTERRUPTER		DOUBLE THROW	IMC	INTERMEDIATE METAL CONDUIT	NTS	NOT TO SCALE	TV	TELEVISION		
		AIR HANDLING UNIT	DWG	DRAWING		INCANDESCENT	ОН	OVERHEAD	TVTC	TELEVISION TERMINAL CABINET		
		ALUMINUM		ELECTRICAL CONTRACTOR	IR	INFRARED	OL	OVERLOADS	TYP	TYPICAL		
		ALTERNATE		ELECTRIC, ELECTRICAL	I/W	INTERLOCK WITH	PA	PUBLIC ADDRESS	UC	UNDER COUNTER		
		AMPERE		ELEVATOR		JUNCTION BOX	PB	PULL BOX OR PUSHBUTTON	UE	UNDERGROUND ELECTRICAL		
		AMPLIFIER	EM	EMERGENCY	KV	KILOVOLT	PE	PNEUMATIC ELECTRIC	UG	UNDERGROUND		
		ANNUNCIATOR		ENERGY MANAGEMENT SYSTEM	KVA	KILOVOLT-AMPERE	PED	PEDESTAL	UH	UNIT HEATER		
		APPROXIMATELY		ELECTRICAL METALLIC TUBING	KVAR	KILOVOLT-AMPERE REACTIVE	PF	POWER FACTOR	UT	UNDERGROUND TELEPHONE		
		AQUASTAT	EP	ELECTRIC PNEUMATIC	KW	KILOWATT	PH	PHASE	UTIL	UTILITY		
		ARCHITECT, ARCHITECTURAL	EQUIP	EQUIPMENT	KWH	KILOWATT HOUR	PIV	POST INDICATING VALVE	UV	UNIT VENTILATOR OR ULTRAVIOLET		
		AMP SWITCH	EWC	ELECTRIC WATER COOLER	LOC	LOCATE OR LOCATION	PNL	PANEL	V	VOLT		
		AMP TRIP		EXISTING	LT	LIGHT	PP	POWER POLE	VA	VOLT-AMPERES		
		AUTOMATIC TRANSFER SWITCH		EXHAUST	LTG	LIGHTING	PR	PAIR	VDT	VIDEO DISPLAY TERMINAL		
		AUTOMATIC		EXPLOSION PROOF		LIGHTNING	PRI	PRIMARY	VERT	VERTICAL		
		AUXILIARY		FIRE ALARM	LV	LOW VOLTAGE		PROJECTION	VFD	VARIABLE FREQUENCY DRIVE		
	AV	AUDIO VISUAL	FABP	FIRE ALARM BOOSTER POWER	MAX	MAXIMUM	PRV	POWER ROOF VENTILATOR	VOL	VOLUME		
	AWG	AMERICAN WIRE GAUGE		SUPPLY PANEL		MAGNETIC STARTER	PT	POTENTIAL TRANSFORMER	W	WATT		
		BATTERY	FACP	FIRE ALARM CONTROL PANEL	M/C	MOMENTARY CONTACT	PVC	POLYVINYL CHLORIDE (CONDUIT)	W/	WITH		
	BD	BOARD	FCU	FAN COIL UNIT	MC	MECHANICAL CONTRACTOR	PWR	POWER	WG	WIRE GUARD		
		BUILDING		FIXTURE	MCB	MAIN CIRCUIT BREAKER		QUANTITY	WH	WATER HEATER		
	BMS	BUILDING MANAGEMENT SYSTEM	FLR	FLOOR	MCC	MOTOR CONTROL CENTER	RCPT	RECEPTACLE	W/O	WITHOUT		
	С	CONDUIT	FLUOR	FLUORESCENT	MDC	MAIN DISTRIBUTION CENTER	REQD	REQUIRED	WP	WEATHERPROOF		
	CAB	CABINET	FU	FUSE	MDP	MAIN DISTRIBUTION PANEL	RM	ROOM	XFMR	TRANSFORMER		
	CAT	CATALOG	FUDS	FUSED SAFETY DISCONNECT SWITCH	MFR	MANUFACTURER	RSC	RIGID STEEL CONDUIT	XFR	TRANSFER		
	CATV	CABLE TELEVISION	GA	GAUGE	MFS	MAIN FUSED DISCONNECT SWITCH	l RTU	ROOF TOP UNIT	@ A	AT		
		CIRCUIT BREAKER	GAL	GALLON	MH	MANHOLE	SC	SURFACE CONDUIT	' F	EET		
	CCTV	CLOSED CIRCUIT TELEVISION	GALV	GALVANIZED	MIC	MICROPHONE	SEC	SECONDARY	"	NCHES		
	CKT	CIRCUIT	GC	GENERAL CONTRACTOR	MIN	MINIMUM	SHT	SHEET	# 1	NUMBER		
	CLG	CEILING	GEN	GENERATOR	MISC	MISCELLANEOUS	SIM	SIMILAR	Ø F	PHASE		
	COMB	COMBINATION		GROUND FAULT CIRCUIT	MLO	MAIN LUGS ONLY	S/N	SOLID NEUTRAL	C (CENTER LINE		
	CMPR	COMPRESSOR	INTERRU	JPTER	MMS	MANUAL MOTOR STARTER	SPEC	SPECIFICATION	P F	PLATE		
		CONNECTION	GFP	GROUND FAULT PROTECTOR	MOA	MULTIOUTLET ASSEMBLY	SPKR	SPEAKER				
	CONST	CONSTRUCTION		GROUND	MSP	MOTOR STARTER PANELBOARD	SP	SPARE				
	CONT	CONTINUATION OR CONTINUOUS	GRS	GALVANIZED RIGID STEEL (CONDUIT)	MSBD	MAIN SWITCHBOARD	SR	SURFACE RACEWAY				
		CONTRACTOR		GYPSUM BOARD	MT	MOUNT	SS	STAINLESS STEEL				
	CONV	CONVECTOR		HANDS-OFF-AUTOMATIC SWITCH	MT.C	EMPTY CONDUIT	SSW	SELECTOR SWITCH				
	CP	CIRCULATING PUMP	HORIZ	HORIZONTAL	MTS	MANUAL TRANSFER SWITCH	S/S	STOP/START PUSHBUTTONS				
	CRT	CATHODE-RAY TUBE		HORSEPOWER	MTR	MOTOR, MOTORIZED	STA	STATION				
	CT	CURRENT TRANSFORMER	HPF	HIGH POWER FACTOR	N.C.	NORMALLY CLOSED	STD	STANDARD				
		CENTER			NEC	NATIONAL ELECTRICAL CODE	SURF	SURFACE MOUNTED				
- 1	CU	COPPER					SW	SWITCH				

E000	ELECTRICAL SYMBO	OLS AND ABBREVIATIONS		
E101	ELECTRICAL SITE P	LAN		
E201	ELECTRICAL FIRST	FLOOR LIGHTING PLAN		
E301	ELECTRICAL FIRST	FLOOR POWER PLAN		
E302	ELECTRICAL BARN	AND GARAGE POWER ANI)	
E303	ELECTRICAL ROOF	POWER PLAN		
E601	ELECTRICAL SCHED	DULES		
E701	ELECTRICAL SINGLI	E LINE AND DETAILS		
E1001	ALTERNATES 003 & SPAY/NEUTER CLIN	004 - GENERATOR AND IC		
E1002	ALTERNATES 005 & ALTERNATES	006 -OUTDOOR DOG RUN		

		E701 ELE E1001 ALT SP/ E1002 ALT	ECTRICAL SCHEDULE ECTRICAL SINGLE LIN TERNATES 003 & 004 AY/NEUTER CLINIC TERNATES 005 & 006 TERNATES	IE AND DETAILS - GENERATOR AND	N		
					LIGH	ITING FIXTURE SCHEDULE	
3	WATTS	VOLTAGE	LAMP TYPE	COLOR TEMP.	MODEL NUMBER	DESCRIPTION	COMMENTS
	36W	120V	LED	3500 K	DAY-BRITE / 2AVEG49L835-4-ACR-UNV-DIM	2'x4' LAY-IN RECESSED ARCHITECTURAL BASKET FIXTURE, WHITE ACRYLIC FINISH, RIBBED ACRYLIC WHITE LENS, 80+ CRI	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY.
	36W	120V	LED	3500 K	DAY-BRITE / 2AVEG49L835-4-ACR-UNV-DIM	2'x4' LAY-IN RECESSED ARCHITECTURAL BASKET FIXTURE, WHITE ACRYLIC FINISH, RIBBED ACRYLIC WHITE LENS, 80+ CRI	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY.
	29W	120V	LED	3000 K	DAY-BRITE / 2AVEG32L835-2-ACR-UNV-DIM	2'x4' LAY-IN RECESSED ARCHITECTURAL BASKET FIXTURE, WHITE ACRYLIC FINISH, RIBBED ACRYLIC WHITE LENS, 80+ CRI	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY.
	29W	120V	LED	3000 K	DAY-BRITE / 2AVEG32L835-2-ACR-UNV-DIM	2'x4' LAY-IN RECESSED ARCHITECTURAL BASKET FIXTURE, WHITE ACRYLIC FINISH, RIBBED ACRYLIC WHITE LENS, 80+ CRI	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY.
	49W	120V	LED	3500 K	DAY-BRITE / 2TG54L835-4-FA-12F-UNV-DIM COLUMBIA LIGHTING / LJT24-30HLG-FAA12125-EDU (OR APPROVED EQUAL)	2'x4 LAY-IN PRISMATIC TROFFER, .125" PATTERN 12 ACRYLIC LENS, WHITE FINISH, FLAT ALUMINUM DOOR, ELECTRONIC 0-10V DIMMING DRIVER	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY.
	49W	120V	LED	3500 K	DAY-BRITE / 2TG54L835-4-FA-12F-UNV-DIM COLUMBIA LIGHTING / LJT24-30HLG-FAA12125-EDU (OR APPROVED EQUAL)	2'x4 LAY-IN PRISMATIC TROFFER, .125" PATTERN 12 ACRYLIC LENS, WHITE FINISH, FLAT ALUMINUM DOOR, ELECTRONIC 0-10V DIMMING DRIVER	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY.
	43W	120V	LED	3500 K	DAY-BRITE / 2TG38L835-2-FA-12F-UNV-DIM	2'x2' LAY-IN PRISMATIC TROFFER, .125" PATTERN 12 ACRYLIC LENS, WHITE FINISH, FLAT ALUMINUM DOOR, ELECTRONIC 0-10V DIMMING DRIVER	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY.
	30W	120V	LED	3000 K	ILP / WTZ8-50WLED-UNIV-30-RAFL	8' LINEAR FULLY ENCLOSED AND GASKETED FIXTURE, WHITE FINISH, ELECTRONIC DRIVER, RIBBED FROSTED ACRYLIC LENS, WET LOCATION LISTED	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY.
	30W	120V	LED	3000 K	ILP / WTZ8-50WLED-UNIV-30-RAFL	8' LINEAR FULLY ENCLOSED AND GASKETED FIXTURE, WHITE FINISH, ELECTRONIC DRIVER, RIBBED FROSTED ACRYLIC LENS, WET LOCATION LISTED	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY.
	111W	120V	LED	3000 K	DAY-BRITE / LF4FR6030UDZ COLUMBIA LIGHTING / LCL8-30HL-EU	8' LENSED LED STRIPLIGHT, WHITE STEEL HOUSING, ACRYLIC LENS, ELECTRONIC 0-10V DIMMING DRIVER	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY. FIXTURES TO BE SUSPENDED AT 12'-0" A.F.F.
	111W	120V	LED	3000 K	DAY-BRITE / LF4FR6030UDZ COLUMBIA LIGHTING / LCL8-30HL-EU	8' LENSED LED STRIPLIGHT, WHITE STEEL HOUSING, ACRYLIC LENS, ELECTRONIC 0-10V DIMMING DRIVER	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY. FIXTURES TO BE SUSPENDED AT 12'-0" A.F.F.
	3.6W	120V AC/6V DC	LED		EVENLITE / SOV-EM-G-1C-BAUC DUAL-LITE / LECSG_NE	SINGLE FACE EDGE-LIT EXIT SIGN, GREEN LETTERS, CLEAR ACRYLIC PLAQUE, CEILING MOUNTED, 90 MINUTE MINIMUM EMERGENCY OPERATION, CHEVRON ARROWS (AS NECESSARY), SATIN ALUMINUM FINISH	EXIT SIGNS SHALL BE INSTALLED CENTERED, OVERTOP OF EGRESS DOORS.
	3.7W	120V AC/6V DC	LED		EVENLITE / SOV-EM-G-2M-BAUC DUAL-LITE / LECDG_NE	DUAL FACE EDGE-LIT EXIT SIGN, GREEN LETTERS, CLEAR ACRYLIC PLAQUE, CEILING MOUNTED, 90 MINUTE MINIMUM EMERGENCY OPERATION, CHEVRON ARROWS (AS NECESSARY), SATIN ALUMINUM FINISH	EXIT SIGNS SHALL BE INSTALLED CENTERED, OVERTOP OF EGRESS DOORS.
	6W	120V AC/6V DC	LED		EVENLITE / TLX-EM-GU-W (OR APPROVED EQUAL)	WHITE THERMOPLASTIC HOUSING, 90 MINUTE MINIMUM EMERGENCY BATTERY, GREEN LETTERS, CEILING MOUNTED,	EXIT SIGNS SHALL BE INSTALLED CENTERED, OVERTOP OF EGRESS DOORS.
	29W	120V	LED	3500 K	LIGHTOLIER / C6X6L-20-N-U-VB-Z10V-C6X6L-1520-DL-35K-CL-W (OR APPROVED EQUAL)	6" LENSED SQUARE DOWNLIGHT, 0-10V DIMMING ELECTRONIC DRIVER, MATTE REFLECTOR FINISH, SQUARE TRIM	E.C. SHALL COORDINATE SQUARE TRIM WITH G.C. AND ARMSTRONG CEILING VENDOR. E.C. SHALL BE RESPONSIBLE FOR MOUNTING FIXTURES ABOVE CEILING FOR CONNECTION TO TRIM.
	29W	120V	LED	3500 K	LIGHTOLIER / C6X6L-20-N-U-VB-Z10V-C6X6L-1520-DL-35K-CL-W (OR APPROVED EQUAL)	6" LENSED SQUARE DOWNLIGHT, 0-10V DIMMING ELECTRONIC DRIVER, MATTE REFLECTOR FINISH, SQUARE TRIM	E.C. SHALL COORDINATE SQUARE TRIM WITH G.C. AND ARMSTRONG CEILING VENDOR. E.C. SHALL BE RESPONSIBLE FOR MOUNTING FIXTURES ABOVE CEILING FOR CONNECTION TO TRIM.
	11W	120V	LED	3000 K	ELITE / ET-LED-216-800L-DIMTR-120-NFL-30K-90	LED TRACK FIXTURE. POLYCARBONATE OPITCAL REFRACTOR, DIE-CAST HEAT SINK, BODY CONSTURCTED OF EXTRUDED ALUMINUM, 0-10V DIMMING.	TRACK FIXTURES SHALL BE MOUNTED TO TRACK MODEL#ET2. E.C. SHALL FURNISH AND INSTALL ALL TRACKS AND ASSOCIATED ACCESSORIES REQUIRED FOR OPERATION OF TRACK LIGHTING.
	47W	120V	LED	4000 K	CERTOLUX / CRIU2x4A/PLED840K055LUNV	2'x4' SPECIFICATION GRADE, IC RATED CLEAN ROOM FIXURE, .125" PRISMATIC ACRYLIC LENS, 0-10V DIMMING ELECTRONIC DRIVER, 18 GA. CRS PAINTED DOOR, 20 GA. CRS PAINTED HOUSING, LAY-IN TROFFER, TIG WELDED SEAMS	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY.
	53W	120V	LED	5000 K	VISCOR / LRTA-C29-2x4-LED8-50K-063LUNV	2'x4' SPECIFICATION GRADE LAY-IN TROFFER, IC RATED WET LOCATION FIXURE, .125" FROSTED PRISMATIC ACRYLIC LENS, 0-10V DIMMING ELECTRONIC DRIVER, 20 GA. WHITE POLYESTER PAINTED HOUSING	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY.
	53W	120V	LED	5000 K	VISCOR / LRTA-C29-2x4-LED8-50K-063LUNV	2'x4' SPECIFICATION GRADE LAY-IN TROFFER, IC RATED WET LOCATION FIXURE, .125" FROSTED PRISMATIC ACRYLIC LENS, 0-10V DIMMING ELECTRONIC DRIVER, 20 GA. WHITE POLYESTER PAINTED HOUSING	ALL FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY.
	30W	120V	LED	4000 K	GARDCO / PWS-140L-650-NW-G2-4-EBPC-UNV-DD-BZ (OR APPROVED EQUAL)	FULL CUT-OFF ARCHITECTURAL WALL PACK, IP65 RATED, DIE-CAST ALUMINUM HOUSING, DARK BRONZE FINISH, COMFORT CLEAR LENS, -40 DEG. F STARTING ELECTRONIC DRIVER, -20 DEG. F. STARTING EMERGENCY BATTERY BACKUP, ALUMINUM HOUSING, 90 MINUTE MINIMUM INTEGRAL EMERGENCY BATTER, COLD WEATHER BATTERY, 0-10V DIMMING DRIVER	FIXTURE SHALL BE MOUNTED CENTERED, OVERTOP OF EGRESS DOORS AT A MOUNTING HEIGHT OF 10'-0" A.F.G. AS MEASURED TO BOTTOM OF FIXTURE. FIXTURES LABELED "EM" SHALL BE PROVIDED WITH AN EMERGENCY BACKUP BATTERY WITH A MINIMUM 90 MINUTE EMERGENCY OPERATION.
	95W	120V	LED	4000 K	GARDCO / SVPG-140L-2100-NW-G2-SM-5-UNV	LED SURFACE MOUNT FIXTURE. DIE-CAST ALUMINUM LOWER HOUSING, UPPER POLYCARBONATE LENS, UV-RESISTANT ACRYLIC LOWER LENS. IP66 RATED WITH SEAL AROUND ENTIRE PERIMETER OF THE LENS. EDGE-LIT, LIGHT GUIDE TECHNOLOGY.VIBRATION RESISTANT HOUSING.	E.C. SHALL COORDINATE EXACT MOUNTING LOCATION WITH OVERHEAD DOORS.
	13.6W	120V	LED	3500 K	GAMMALUX / GB24B2-1/1SL358-120-ZTV1-4'N-CXX-LDC/ASLMD-WH	PENDANT MOUNTED LINEAR LED FIXTURE. EXTRUDED ALUMINUM BODY, ONE TOOL INSTALLATION, ACRYLIC SATIN LENS, 0-10V DIMMING.	
	3.6W/FT	120V	LED	3000 K	DURATAPE / DL-ES-44-I-30-HC-24	COVE AND ARCHITECTURAL LED TAPELIGHT, FACTORY PREPPED ENDS, INSTALLATION READY TAPE. ALUMINUM CHANNEL SUPPORT.	E.C. TO PROVIDE FIXTURE WITH ADJUSTABLE MOUNTING BRACKET AND REMOTE DRIVER. E.C. SHALL INSTALL 0-10V DIMMING MODULE IN COVE, E.C. SHALL COORDINATE LOCATIONS IN FIELD WITH FIXTURE INSTALLATION.

GRADE. MEASURED TO BOTTOM OF FIXTURE

LOCATION LISTED, IPP66 RATED,

SINGLE HEAD POLE FIXTURE. TYPE 3 DISTRIBUTION, HIGH OUTPUT, MOUNTED AT 20' ABOVE

GARDCO / DFC7-ST-RM-16L-700-NW-G2-UNV-BZ (OR STANCHION MOUNTED FLOOD LIGHT, STANDARD CUTOFF HOOD, RECTANGULAR MEDIUM E.C. SHALL AIM FLOODLIGHTS AT MONUMENT SIGNAGE. E.C. SHALL INSTALL FIXTURE SO AS

GARDCO / P26-140L-1150-NW-G2-AR-3-120

GARDCO / PPT-140L-1150-NW-G2-T3-5-120

APPOVED EQUAL)

4000 K

DETAIL ON DRAWING E701 FOR MOUNTING DETAILS.

MOUNTING DETAILS.

MOUNTING DETAILS.

POST TOP MOUNTED FIXTURE. TYPE 5 DISTRIBUTION, HIGH OUTPUT, MOUNTED AT 14' ABOVE FIXTURE TO BE MOUNTED ON 14' POLE. REFER TO POLE BASE DETAIL ON DRAWING E701 FOR

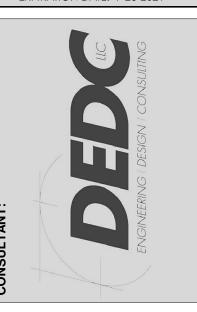
FLOOD DISTRIBUTION, BRONZE POLYESTER POWDER COAT FINISH, ELECTRONIC DRIVER, WET TO PREVENT LIGHT SPILLAGE ABOVE AND BESIDE SIGN. REFER TO POLE BASE MOUTNING

FIXTURE TO BE MOUNTED ON 20' POLE. REFER TO POLE BASE DETAIL ON DRAWING E701 FOR



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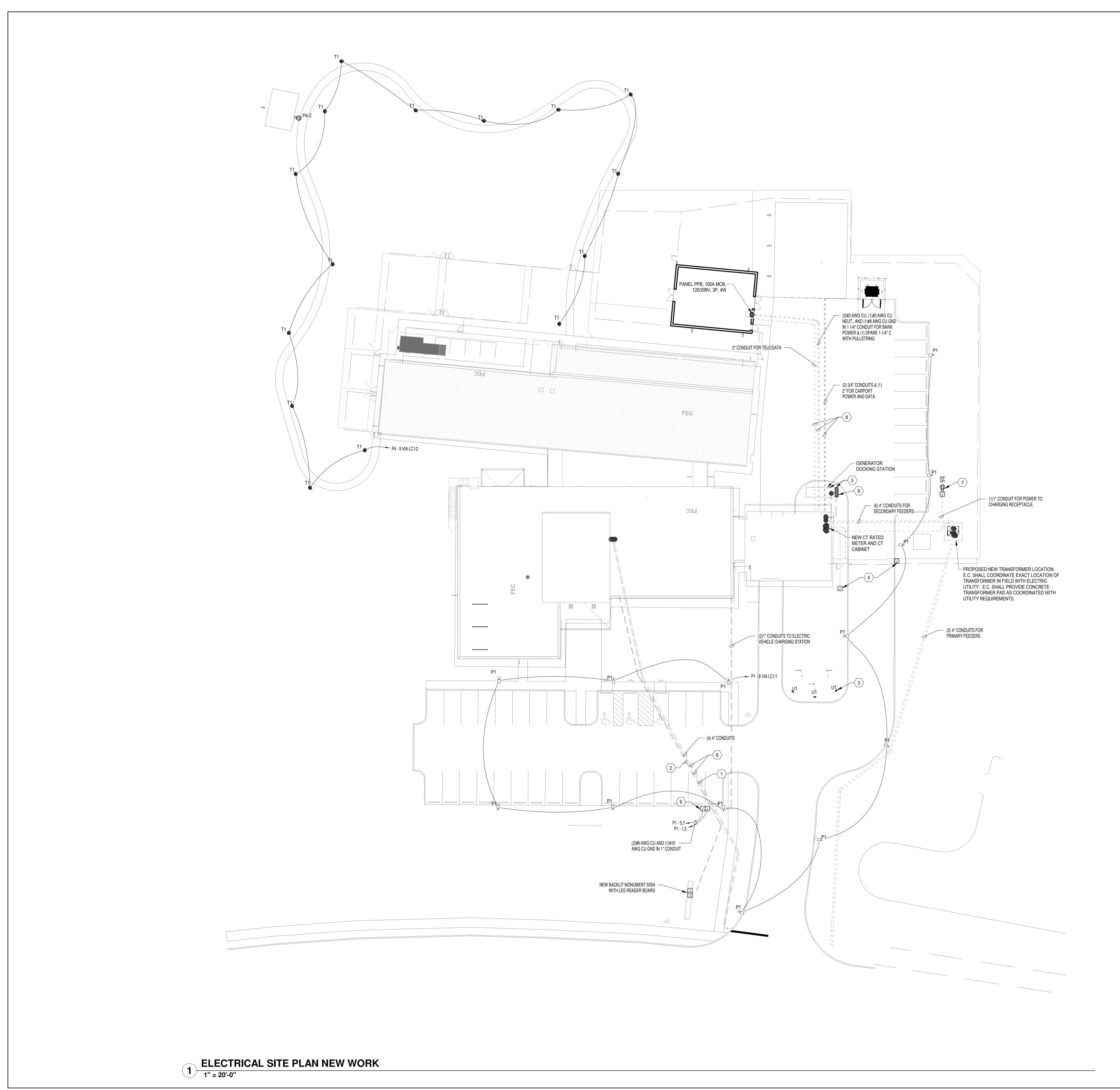
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DESCRIPTION DATE

PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED:

12/23/2019 DRAWING TITLE: **ELECTRICAL SYMBOLS** AND ABBREVIATIONS SHEET NUMBER:



General Notes - Site Plans

ALL CONDUITS SHALL BE FURNISHED AND INSTALLED WITH PULLSTRINGS. ALL CONDUITS SHALL BE INSTALLED IN TRENCH UTILIZING RED METALLIC MARKER TAPE AT A MAXIMUM OF 12" B.F.G. CENTERED OVERTOP OF CONDUITS IN TRENCH. E.C. SHALL BE RESPONSIBLE FOR FURNISHING AND INSTALLING ALL PRIMARY AND SECONDARY CONDUITS FROM PRIMARY ELECTRICAL UTILITY CONNECTION POINT TO THE TRANSFORMER AND THEN FROM THE TRANSFORMER TO THE ELECTRICAL SERVICE ENTRANCE DISCONNECT. E.C. SHALL FURNISH AND INSTALL PULLSTRINGS IN ALL ELECTRICAL UTILITY SERVICE CONDUITS. E.C. SHALL FURNISH AND INSTALL NEW TRANSFORMER CONCRETE PAD AS COORDINATED WITH ELECTRICAL UTILITY. E.C. SHALL PROVIDE ALL OPENINGS IN TRANSFORMER PAD FOR PRIMARY AND SECONDARY CONDUIT INSTALLATION INTO TRANSFORMER ENCLOSURE. E.C. SHALL FURNISH AND INSTALL CT CABINET AND METER PAN FOR ELECTRICAL SERVICE. ALL CONDUCTORS FEEDING EXTERIOR LIGHTING AND POWER CIRCUITS SHALL BE #10 AWG MINIMUM AND SHALL BE RAN IN 1" CONDUIT. E.C. SHALL FURNISH AND INSTALL A NEW CONCRETE PAD FOR THE STANDBY GENERATOR. E.C. SHALL COORDINATE LOCATION OF GENERATOR WITH ARCHITECTURAL AND CIVIL DRAWINGS. ELECTRICAL SERVICE ENTRANCE FEEDERS SHALL BE FURNISHED AND INSTALLED IN CONCRETE DUCTBANK. SEE CONCRETE DUCTBANK DETAIL ON DRAWING E601. E.C. SHALL COORDINATE ALL SITE ELECTRICAL WORK IN FIELD.

KEYNOTES

- 1 E.C. SHALL FURNISH AND INSTALL (4) 4" CONDUITS OUT TO UTILITY TELE/DATA UTILITY COMPANY CONNECTION POINT. E.C. SHALL COORDINATE EXACT LOCATION OF CONNECTION IN FIELD WITH UTILITY REPRESENTATIVE.
- 2 E.C. SHALL FURNISH AND INSTALL (2) 1" CONDUITS FROM BUILDING PERIMETER WALL OUT TO MONUMENT SIGN TO MAKE POWER AND DATA CONNECTIONS. E.C. SHALL FURNISH AND INSTALL CAT-6A CABLE TO MONUMENT SIGN FROM I.T. ROOM. E.C. SHALL INSTALL CONDUITS AT 3'-0" B.F.G. AS MEASURED TO TOP OF CONDUIT. E.C. SHALL COORDINATE ALL WORK IN FIELD.
- 3 FLOODLIGHTS FOR FLAGPOLE ILLUMINATION. E.C. TO COORDINATE ORIENTATION AND PLACEMENT IN FIELD WITH FLAG POLE LOCATION. E.C. SHALL ENSURE PROPER ILLUMINATION OF FLAG USING FLOODLIGHTS PRIOR TO COMPLETION OF WORK.
- COMPLETION OF WORK.

 4 POWER AND DATA FOR GATE. E.C. SHALL COORDINATE EXACT LOCATION AND CIRCUITING REQUIREMENTS IN FIELD PRIOR TO INSTALLATION.

 5 E.C. SHALL FURNISH AND INSTALL AN 800A, 120/208V,
- DOCKING STATION FOR CONNECTION OF A TEMPORARY
 ROLL-UP GENERATOR IN THE BASE BID. E.C. SHALL FURNISH
 A NEW CONCRETE PAD SIZED FOR A FUTURE 300kW
 PERMANENT GENERATOR IN THIS LOCATION AS PART OF THE
 BASE BID WITH CONDUITS FROM THE AUTOMATIC TRANSFER
 SWITCH TO THE GENERATOR PAD AND STUBBED UP. E.C.
 SHALL COORDINATE ALL WORK IN FIELD.

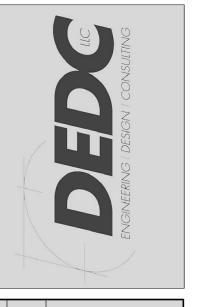
 6 POWER FOR ELECTRIC VEHICLE CHARGING STATION. E.C.
- SHALL PROVIDE A NEMA 3R RATED JUNCTION BOX WITH
 WEATHERPROOF COVER FOR INSTALLATIOIN OF ELECTRICAL
 CHARGING STATION BY COUNTY. E.C. SHALL COORDINATE
 ALL WORK WITH COUNTY.
- F.C. SHALL PROVIDE A NEMA-3R WEATHERPROOF RECEPTACLE ON A 20FT RETRACTABLE CORD. RECEPTACLE SHALL BE A 20A, 120V SIMPLEX RECEPTACLE.
- 8 E.C. SHALL COORDINATE EXACT DEPTH OF CONDUIT IN FIELD WITH STORMWATER PIPING. E.C. SHALL RUN CONDUIT BELOW STORMWATER PIPING WHERE REQUIRED. E.C. SHALL COORDINATE ALL TRENCHING WORK IN FIELD PRIOR TO INSTALLATION.
- 9 E.C. SHALL PROVIDE A SEPARATE LINE ITEM IN THEIR BID FOR THE FOLLOWING WORK: E.C. SHALL FURNISH AND INSTALL NEW 300KW/375KVA, 120/208V, 3P, NATURAL GAS GENERATOR ON CONCRETE GENERATOR PAD.



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(F) 443-403-2460
(E) INFO@MWSARCH.COM
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LICENSE NUMBER: #47259
EXPIRATION DATE: 9-23-2021



CHARLES COUNTY ANIMAL CARE CENTER 5690 PINEY CHURCH ROAD WALDORF, MARYLAND 20602

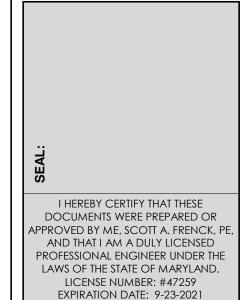
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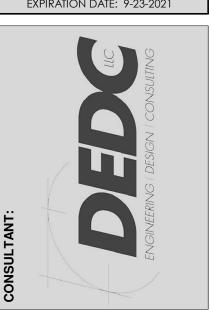
PROJECT NUMBE 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE:
ELECTRICAL SITE PLAN

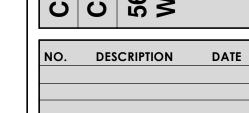
SHEET NUMBER:
E101







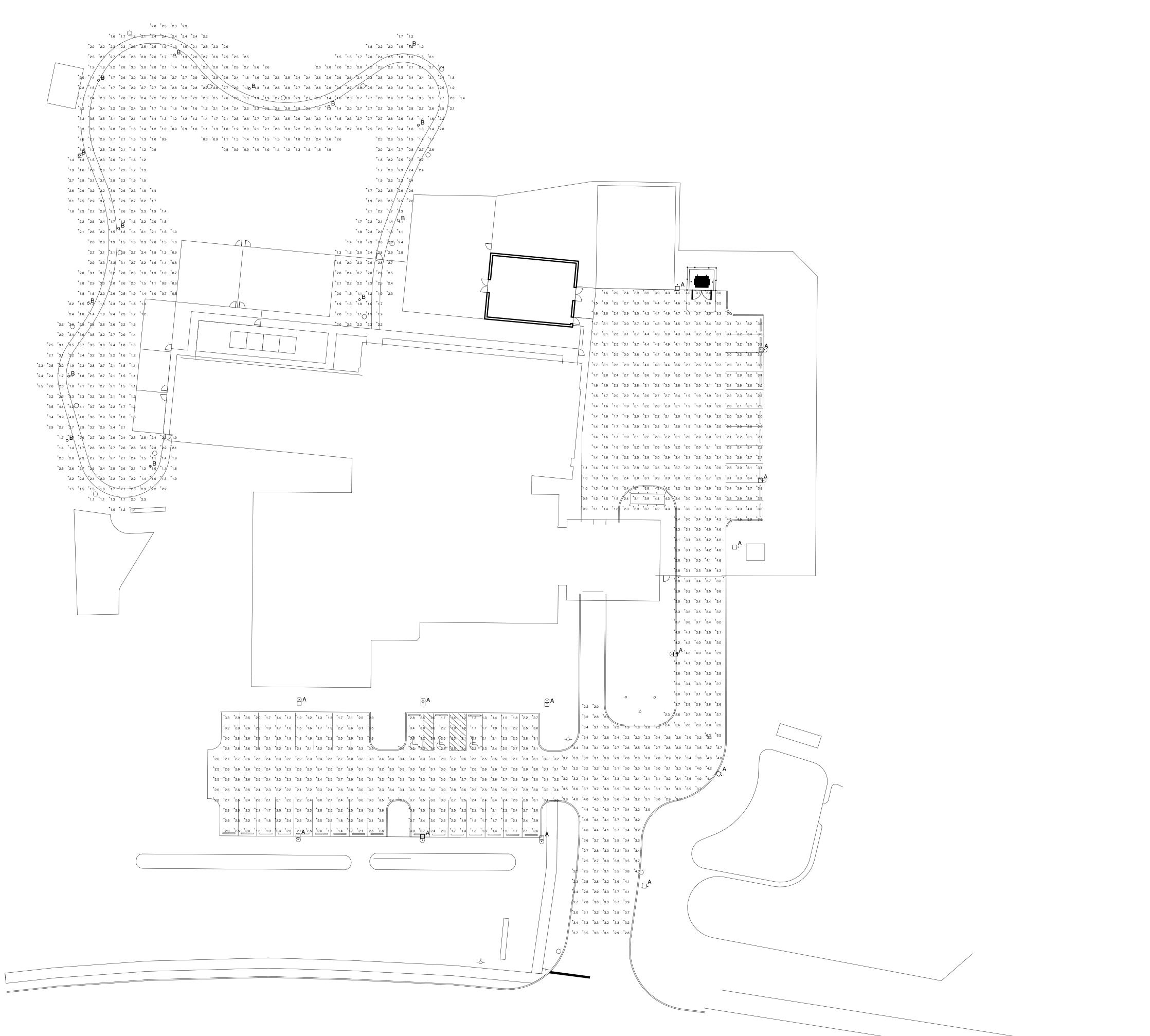
	CONSULTANT:	ENGINEERING DESIGN CONSULTING
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PROJECT NUMBER: 18-034 PROJECT SET: DATE ISSUED:

12/23/2019 DRAWING TITLE: FOOTCANDLE ANALYSIS SITE PLAN

E102



Schedule					
Symbol	Label	QTY	Catalog Number	Number Lamps	Lumen per Lam
	Α	16	P26-48L-400-NW-G2-3	1	8509
	В	14	PPT-140L-1150-NW-G2- 5-UNV	1	5416

FOOTCANDLE ANALYSIS SITE PLAN



- 1 ALL RECESSED LIGHTING FIXTURES IN LAY-IN CEILINGS SHALL BE INSTALLED WITH 6' LONG FLEXIBLE METAL CONDUIT FROM JUNCTION BO MOUNTED
- 2 ALL MOUNTING HEIGHTS FOR LIGHTING FIXTURES ARE TO THE BOTTOM OF THE FIXTURES UNLESS INDICATED OTHERWISE. 3 SEE ARCHITECTURAL EXTERIOR ELEVATIONS FOR MOUNTING HEIGHTS OF
- EXTERIOR LIGHTING FIXTURES. 4 REFER TO SECTION 26 0519 FOR MINIMUM CONDUCTOR SIZE ADJUSTMENTS
- 5 WIRE COUNTS FOR CIRCUIT CONDUCTORS ARE NOT SHOWN. PROVIDE PROPER NUMBER OF CONDUCTORS TO ACHIEVE CIRCUIT AND SWITCHING CONNECTIONS SHOWN.
- 6 CIRCUIT WIRING IS NOT SHOWN EXCEPT FOR SWITCHING INTENT OF FIXTURES AND CONTROL OF DEVICES. CIRCUIT NUMBERS AT DEVICES CORRESPOND TO PANELBOARD BREAKERS (SEE PANELBOARD SCHEDULE). BRANCH CIRCUITS SHALL BE SIZED
- ACCORDING TO THE CIRCUIT BREAKER RATING, UNLESS INDICATED OTHERWISE ON THE ELECTRICAL EQUIPMENT SCHEDULE. 8 ALL EXIT SIGNS SHALL BE FED UNSWITCHED FROM NEAREST LOCAL LIGHTING CIRCUIT IN AREA IN WHICH FIXTURE IS SERVING.
- 9 ALL LIGHT FIXTURES LABELED "EM" SHALL BE INSTALLED WITH AN EXTRA #12 AWG CONDUCTOR FED UNSWITCHED FROM CIRCUIT FEEDING LIGHTS FOR CORRECT EMERGENCY OPERATION OF BACKUP BATTERIES. ALL LIGHTING IN CORRIDORS CONTROLLED BY OCCUPANCY SENSORS SHALL BE FURNISHED AND INSTALLED WITH A FIRE ALARM CONTROL RELAY TO PROVIDE AUTO-ON OF THE LIGHTS IN THE EVENT OF FIRE ALARM OPERATION.

KEYNOTES

E.C. SHALL FURNISH AND INSTALL FIXTURES HUNG ABOVE CEILING. FIXTURES SHALL BE SECURELY MOUNTED FROM ROOF DECK ABOVE. E.C. SHALL COORDINATE EXACT HEIGHT OF FIXTURES WITH ARMSTRONG CEILING CONTRACTOR IN FIELD. E.C SHALL BE RESPONSIBLE FOR PROVIDING TRIM PIECE FOR INSTALLATION OF FIXTURE IN ARMSTRONG CEILING. E.C. SHALL REFER TO FIXTURE "F1" INSTALLATION DETAIL ON DRAWING E701. ALL LIGHTS LABELED NL SHALL BE FED UNSWITCHED FROM

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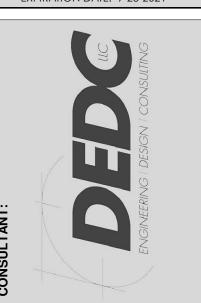
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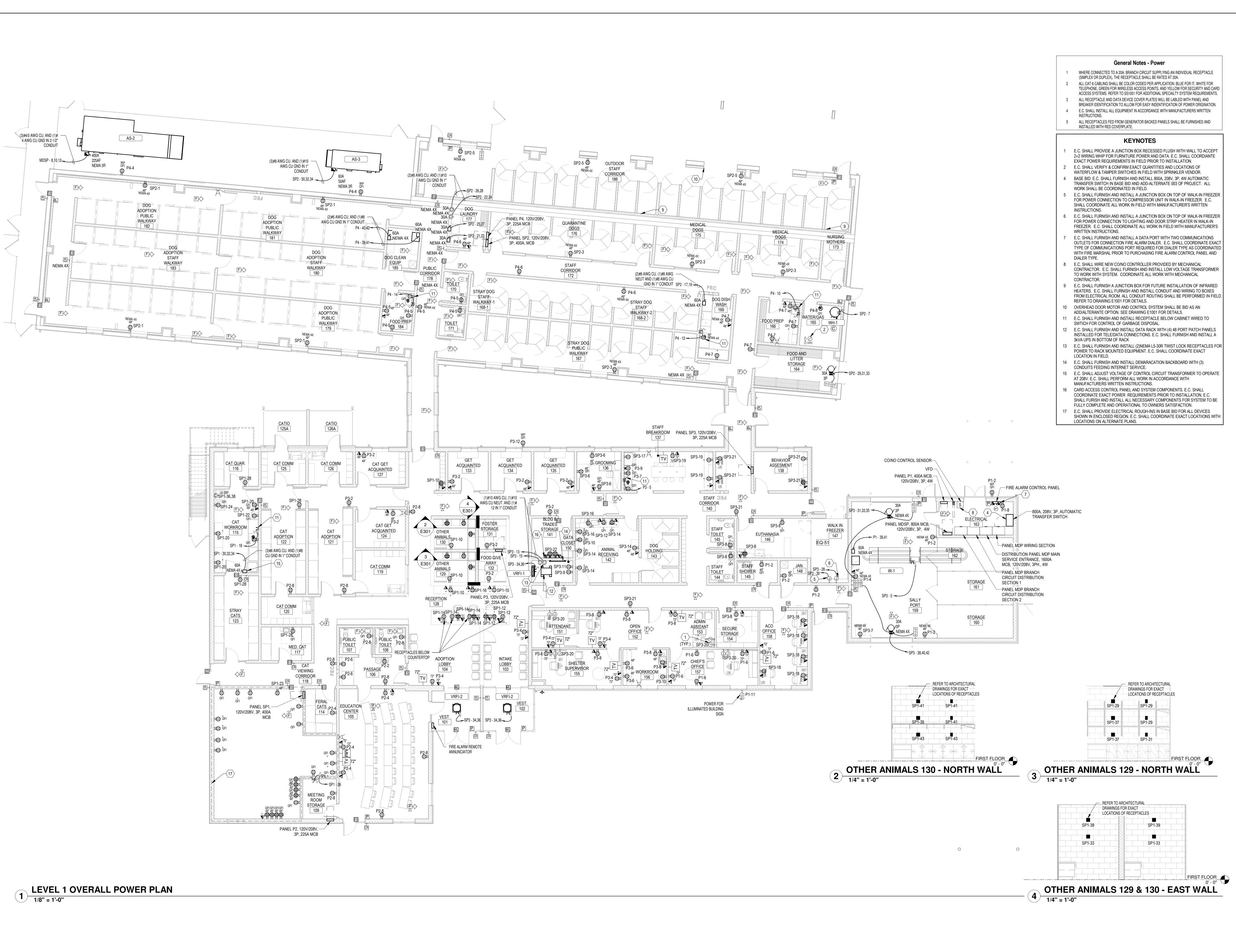
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NO. DESCRIPTION DATE 2 PERMIT COMMENT 5-5-20

PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED:

12/23/2019 DRAWING TITLE: **ELECTRICAL FIRST** FLOOR LIGHTING PLAN SHEET NUMBER: **E201**



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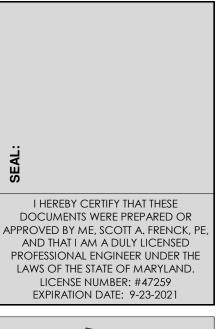
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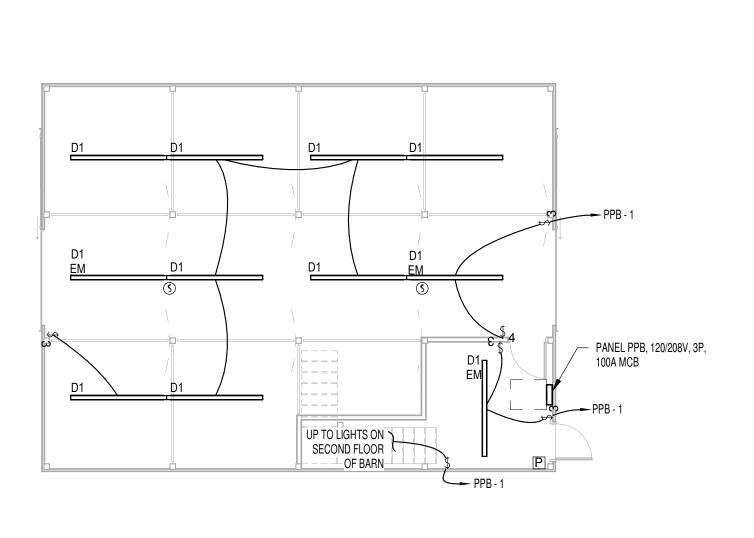
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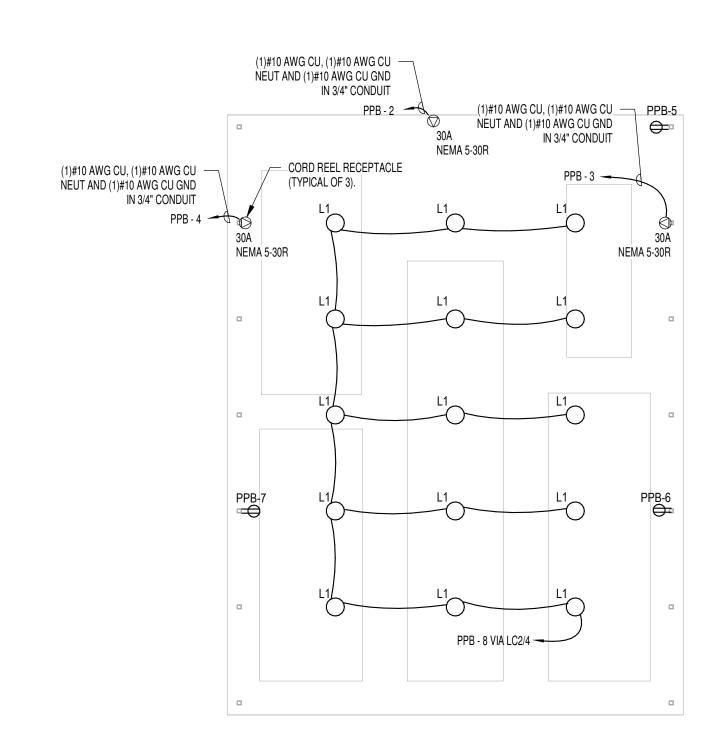
PROJECT NUMBER:
18-034
PROJECT SET:
PERMIT
DATE ISSUED:

PERMIT

DATE ISSUED:
12/23/2019

DRAWING TITLE:
ELECTRICAL FIRST
FLOOR POWER PLAN

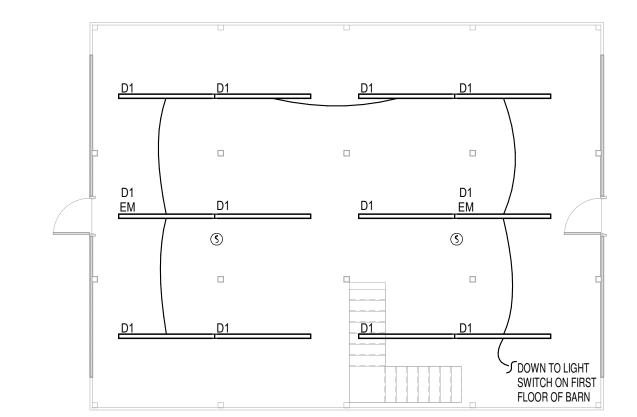




1 ELECTRICAL FIRST FLOOR BARN PLAN
1/8" = 1'-0"

2 ELECTRICAL FIRST FLOOR CARPORT PLAN

1/8" = 1'-0"



3 ELECTRICAL SECOND FLOOR BARN PLAN
1/8" = 1'-0"

General Notes - Power

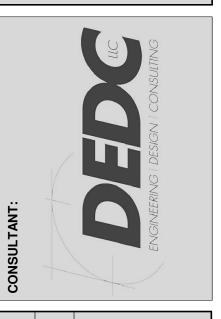
- 1 WHERE CONNECTED TO A 20A. BRANCH CIRCUIT SUPPLYING AN INDIVIDUAL RECEPTACLE (SIMPLEX OR DUPLEX), THE RECEPTACLE SHALL BE RATED AT 20A.
- 2 ALL CAT-6 CABLING SHALL BE COLOR CODED PER APPLICATION: BLUE FOR IT, WHITE FOR TELEPHONE, GREEN FOR WIRELESS ACCESS POINTS, AND YELLOW FOR SECURITY AND CARD
- ACCESS SYSTEMS. REFER TO SS1001 FOR ADDITIONAL SPECAILTY SYSTEM REQUIREMENTS. 3 ALL RECEPTACLE AND DATA DEVICE COVER PLATES WILL BE LABLED WITH PANEL AND BREAKER IDENTIFICATION TO ALLOW FOR EASY INDENTIFICATION OF POWER ORIGINATION.
- 4 E.C. SHALL INSTALL ALL EQUIPMENT IN ACCORDANCE WITH MANUFACTURERS WRITTEN
- 5 ALL RECEPTACLES FED FROM GENERATOR BACKED PANELS SHALL BE FURNISHED AND INSTALLED WITH RED COVERPLATE.

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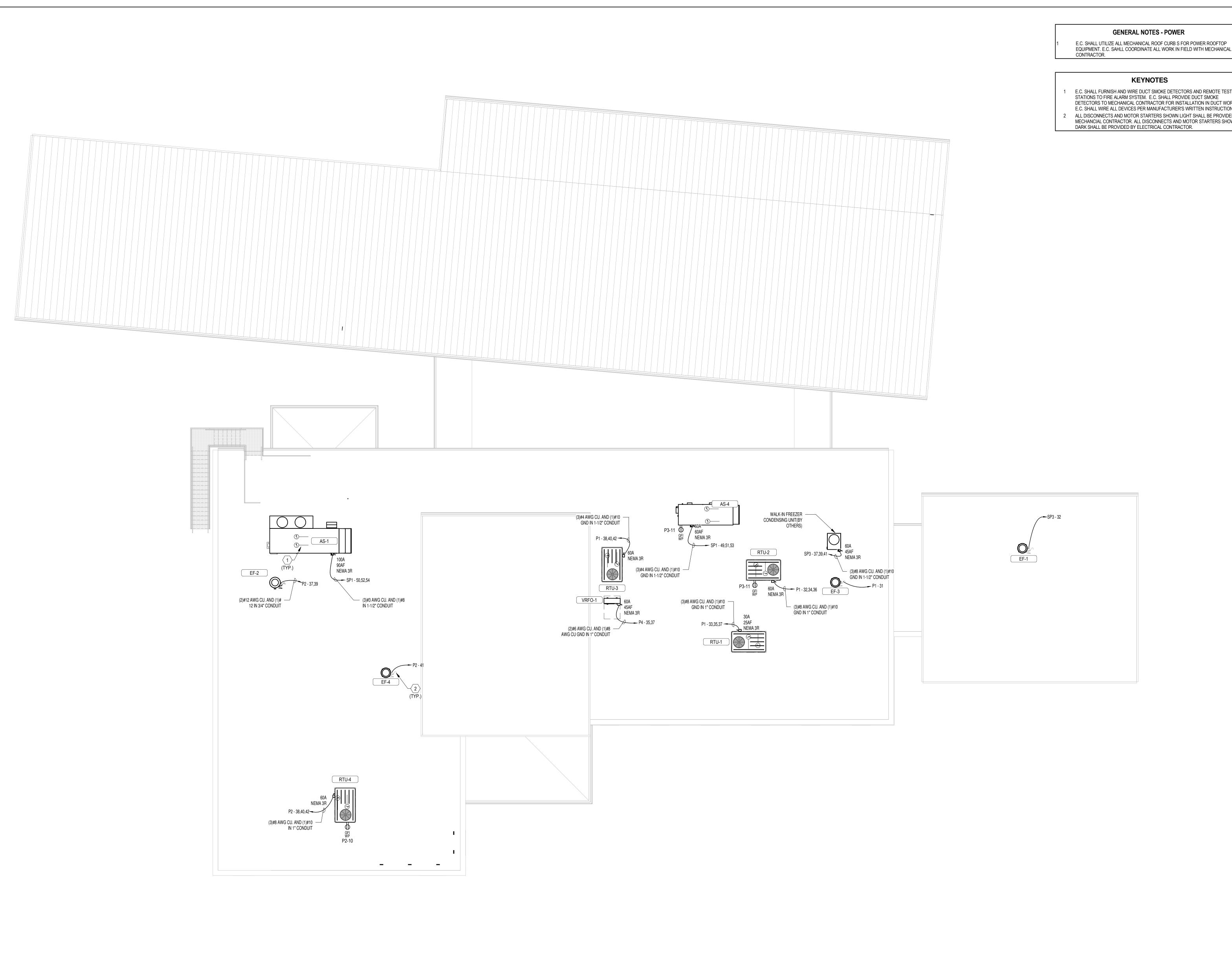
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NO. DESCRIPTION DATE

PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

DRAWING TITLE:
ELECTRICAL BARN AND GARAGE POWER AND LIGHTING PLANS SHEET NUMBER:

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GENERAL NOTES - POWER

EQUIPMENT. E.C. SAHLL COORDINATE ALL WORK IN FIELD WITH MECHANICAL CONTRACTOR.

1 E.C. SHALL FURNISH AND WIRE DUCT SMOKE DETECTORS AND REMOTE TEST STATIONS TO FIRE ALARM SYSTEM. E.C. SHALL PROVIDE DUCT SMOKE DETECTORS TO MECHANICAL CONTRACTOR FOR INSTALLATION IN DUCT WORK. E.C. SHALL WIRE ALL DEVICES PER MANUFACTURER'S WRITTEN INSTRUCTIONS. ALL DISCONNECTS AND MOTOR STARTERS SHOWN LIGHT SHALL BE PROVIDED BY MECHANCIAL CONTRACTOR. ALL DISCONNECTS AND MOTOR STARTERS SHOWN DARK SHALL BE PROVIDED BY ELECTRICAL CONTRACTOR. ARCHITECTURE + MASTER PLANNING 10839-D PHILADELPHIA RD WHITE MARSH, MD 21162 (P) 410-344-1460

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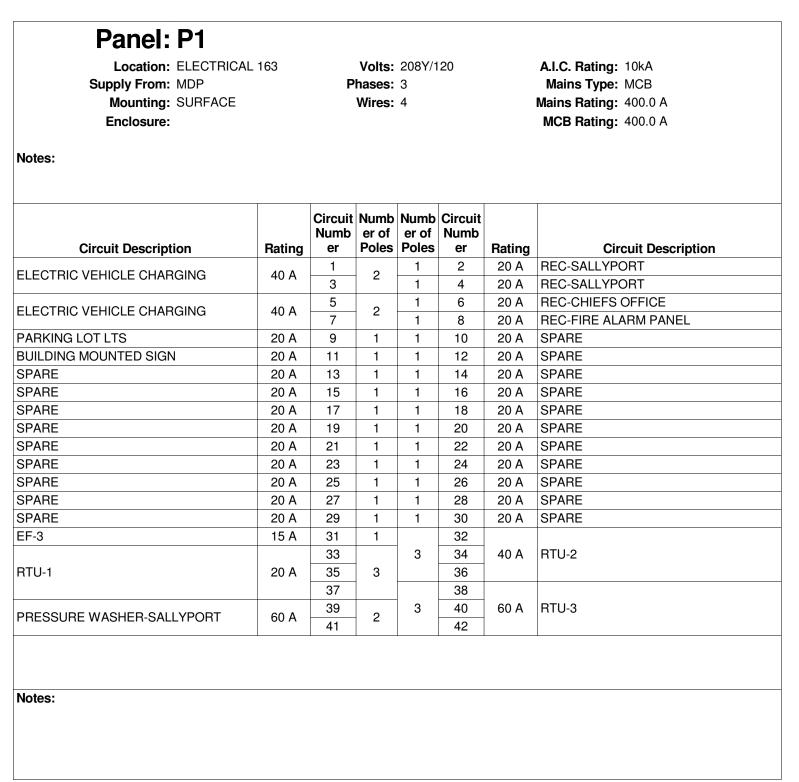
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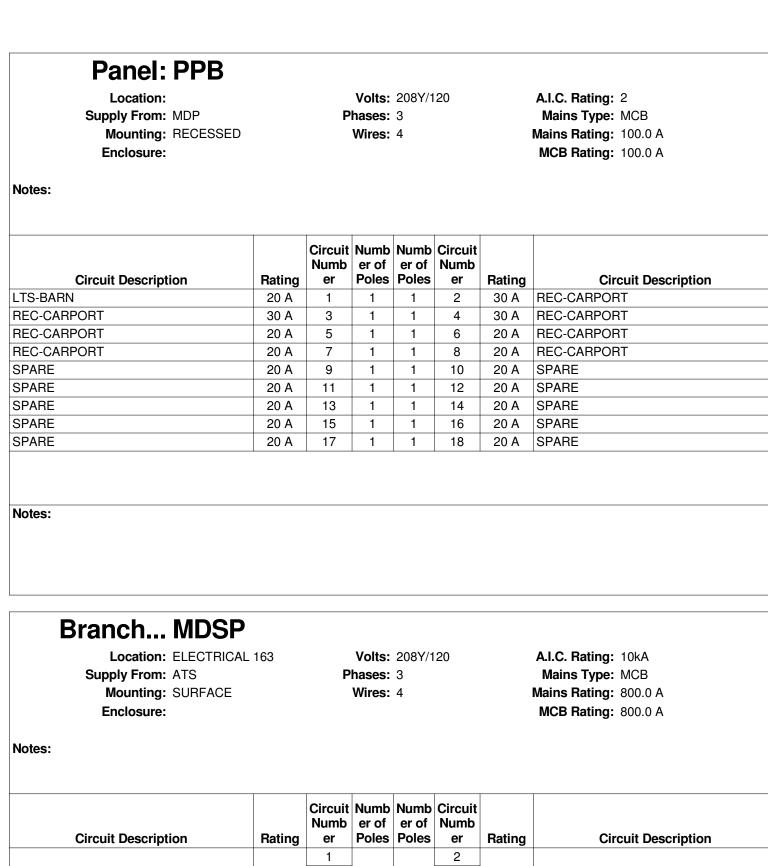
DRAWING TITLE:
ELECTRICAL ROOF POWER PLAN



Panel: P2 Location: MEETING ROOM Supply From: MDP Mounting: RECESSED Enclosure: Notes:				Volts: hases: Wires:		20	A.I.C. Rating: 10kA Mains Type: MCB Mains Rating: 225.0 A MCB Rating: 225.0 A		
Circuit Descript	tion Rati	ı	Circuit Numb er	er of	Numb er of Poles	Circuit Numb er	Rating	Circuit Description	
LTS-LOBBY	20	A	1	1	1	2	20 A	REC-WATER COOLERS	
LTS-CORRIDOR	20	Α	3	1	1	4	20 A	REC- EDUCATION CENTER	
LTS-TRAINING ROOM	20	Α	5	1	1	6	20 A	REC-VENDING MACHINES	
SPARE	20	Α	7	1	1	8	20 A	REC-ED CENTER, BATHROOMS,	
SPARE	20	Α	9	1	1	10	20 A	REC-ROOFTOP EQUIPMENT	
SPARE	20	Α	11	1	1	12	20 A	SPARE	
SPARE	20	Α	13	1	1	14	20 A	SPARE	
SPARE	20	A	15	1	1	16	20 A	SPARE	
SPARE	20	Α	17	1	1	18	20 A	SPARE	
SPARE	20	A	19	1	1	20	20 A	SPARE	
SPARE	20	A	21	1	1	22	20 A	SPARE	
SPARE	20	Α	23	1	1	24	20 A	SPARE	
SPARE	20	Α	25	1	1	26	20 A	SPARE	
SPARE	20	A	27	1	1	28	20 A	SPARE	
SPARE	20	A	29	1	1	30	20 A	SPARE	
SPARE	20	A	31	1	1	32	20 A	SPARE	
SPARE	20	A	33	1	1	34	20 A	SPARE	
SPARE	20	Α	35	1	1	36	20 A	SPARE	
EF-2	15	A	37 39	2	3	38 40	50 A	RTU-4	
	15.	Α	41	1		42			

Location: FOSTER S Supply From: MDP Mounting: RECESSE Enclosure:		P	Volts: hases: Wires:		20		A.I.C. Rating: 2 Mains Type: MCB Mains Rating: 225.0 A MCB Rating: 225.0 A	
Notes:								N
Circuit Description	Rating	Circuit Numb er	er of	Numb er of Poles	Circuit Numb er	Rating	Circuit Description	
LTS-OFFICES, CORRIDOR	20 A	1	1	1	2	20 A	REC-GET ACQUAINTED, STORAGE	Ľ
LTS-BEHAVIOR, GET ACQUAINTED	20 A	3	1	1	4	20 A	REC-TVs LOBBY, OFFICES	L.
REC-GARBAGE DISPOSAL	20 A	5	1	1	6	20 A	REC-OFFICES	R
REC-STAFF BREAKROOM	20 A	7	1	1	8	20 A	REC-OFFICES	R
REC-STAFF BREAKROOM	20 A	9	1	1	10	20 A	REC-OFFICES	Α
REC-ROOFTOP EQUIPMENT	20 A	11	1	1	12	20 A	REC-OUTDOOR	S
SPARE	20 A	13	1	1	14	20 A	SPARE	S
SPARE	20 A	15	1	1	16	20 A	SPARE	S
SPARE	20 A	17	1	1	18	20 A	SPARE	S
SPARE	20 A	19	1	1	20	20 A	SPARE	S
SPARE	20 A	21	1	1	22	20 A	SPARE	S
SPARE	20 A	23	1	1	24	20 A	SPARE	S
SPARE	20 A	25	1	1	26	20 A	SPARE	S
SPARE	20 A	27	1	1	28	20 A	SPARE	S
SPARE	20 A	29	1	1	30	20 A	SPARE	S
SPARE	20 A	31	1	1	32	20 A	SPARE	S
SPARE	20 A	33	1	1	34	20 A	SPARE	S
SPARE	20 A	35	1	1	36	20 A	SPARE	
SPARE	20 A	37	1	1	38	20 A	SPARE] '
OI / II IL		39	1	1	40	20 A	SPARE	Р
SPARE	20 A	- 55						

ng: 2 De: MCB ng: 225.0 A ng: 225.0 A	Panel: P4 Location: DOG LAUND Supply From: MDP Mounting: RECESSED Enclosure:	RY 177	Volts: 208Y/120 Phases: 3 Wires: 4					A.I.C. Rating: 10kA Mains Type: MCB Mains Rating: 225.0 A MCB Rating: 225.0 A		
Circuit Description	Notes: Circuit Description	Rating	Circuit Numb er	er of		Circuit Numb er	Rating	Circuit Description		
ACQUAINTED, STORAGE	LTS-DOG LAUNDRY, CLEANING,	20 A	1	1	1	2	20 A	REC-EXTERIOR		
OBBY, OFFICES	LTS-FOOD, DISHWASH, WATER/GAS	20 A	3	1	1	4	20 A	REC-OUTDOOR		
ES	REC-DOG WING FOOD PREP	20 A	5	1	1	6	20 A	REC-DOG WING CORRIDOR		
CES	REC-FOOD PREP, DISH WASH	20 A	7	1	1	8	20 A	REC-WATER/GAS		
CES	Altro	20 A	9	1	1	10	20 A	REC-GARBAGE DISPOSAL FOOD PREP		
OOR	SPARE	20 A	11	1	1	12	20 A	REC-GARBAGE DISPOSAL FOOD PREP		
	SPARE	20 A	13	1	1	14	20 A	REC-GARBAGE DISPOSAL FOOD PREP		
	SPARE	20 A	15	1	1	16	20 A	SPARE		
	SPARE	20 A	17	1	1	18	20 A	SPARE		
	SPARE	20 A	19	1	1	20	20 A	SPARE		
	SPARE	20 A	21	1	1	22	20 A	SPARE		
	SPARE	20 A	23	1	1	24	20 A	SPARE		
	SPARE	20 A	25	1	1	26	20 A	SPARE		
	SPARE	20 A	27	1	1	28	20 A	SPARE		
	SPARE	20 A	29	1	1	30	20 A	SPARE		
	SPARE	20 A	31	1	1	32	20 A	SPARE		
	SPARE	20 A	33	1	1	34	20 A	SPARE		
	VIDEO 4	45.0	35		1	36	20 A	SPARE		
	VRFO-1	45 A	37	2	1	38	20 A	SPARE		
	PRESSURE WASHER-DOG AREA	60 A	39 41	2	2	40 42	60 A	PRESSURE WASHER-DOG AREA		
	Notes:									



Circuit Description	Rating	Circuit Numb er	er of		Circuit Numb er	Rating	Circuit Description	
		1			2			
PANEL SP1	400.0 A	3	3	3	4	225.0 A	PANEL SP2	
		5			6			
		7			8			
PANEL SP3	225.0 A	9	3	3	10	225.0 A	AS-2	
		11			12			
PANEL GP		13			14			
	60.0 A	15	3	3	16	225.0 A	PREPARED SPACE	
		17			18			
SPACE		19			20		SPACE	
SPACE		21			22		SPACE	
SPACE		23			24		SPACE	
SPACE		25			26		SPACE	
SPACE		27			28		SPACE	
SPACE		29			30		SPACE	

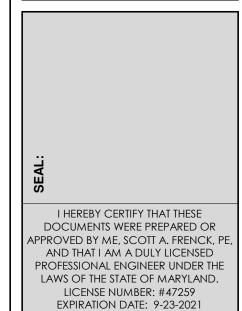
Circuit Description									
Circuit Description									
Circuit Description	Trip	Circuit Numb er	1	Numb er of Poles	Circuit Numb er	Trip	Circuit Description		
LTERNATE: REC-PROCEDURE ROOM		1	1	1	2	•	LTS-CAT AREAS		
LTERNATE: REC-PROCEDURE ROOM		3	1	1	4		LTS-EXTERIOR		
LTERNATE: REC-PROCEDURE ROOM		5	1	1	6				
LTERNATE: REC-PROCEDURE ROOM		7	1	1	8		REC-ROOM 113		
LTERNATE: REC-PROCEDURE ROOM		9	1	1	10		REC-RECEPTION, CORRIDOR		
LTERNATE: REC-PREP ROOM	20.0 A	11	1	1	12		REC-RECEPTION		
LTERNATE: REC-PREP ROOM	20.0 A	13	1	1	14		REC-RECEPTION		
LTERNATE: REC-PREP ROOM	20.0 A	15	1	1	16		REC-RECEPTION		
LTERNATE: REC-PREP ROOM	20.0 A	17	1	1	18		REC-GARBAGE DISPOSAL		
LTERNATE: REC-PREP ROOM	20.0 A	19	1	1	20		REC-CAT WORKROOM		
LTERNATE: REC-PREP ROOM,	20.0 A	21	1	1	22		REC-CAT WORKROOM		
LTERNATE: REC-PREP ROOM DESK	20.0 A	23	1	1	24		REC-CAT WORKROOM		
LTERNATE: REC-CLEAN UP	20.0 A	25	1	1	26		SEWAGE EJECTOR PUMP		
LTERNATE: REC-CLEAN UP	20.0 A	27	1	1	28		REC-CAT ADOPTION, WORKROOM,		
EC-OTHER ANIMALS	20.0 A	29	1		30		,		
EC-OTHER ANIMALS	20.0 A	31	1	3	32	60.0 A	DISHWASHER-CAT WORKROOM		
EC-OTHER ANIMALS	20.0 A	33	1		34				
EC-OTHER ANIMALS	20.0 A	35	1	_	36	00.0.1	DDVED OAT WORKDOO!		
EC-OTHER ANIMALS	20.0 A	37	1	2	38	20.0 A	DRYER-CAT WORKROOM		
EC-OTHER ANIMALS	20.0 A	39	1	1	40	20.0 A	SPARE		
EC-OTHER ANIMALS	20.0 A	41	1	1	42		SPARE		
EC-OTHER ANIMALS	20.0 A	43	1		44				
PARE	20.0 A	45	1	3	46	50.0 A	AS-1A		
F-5	15.0 A	47	1	1	48				
		49			50				
S-4	60.0 A	51	3	3	52	90.0 A	AS-1		
		53]		54				

Location: DOG LAUNDRY 177 Supply From: MDSP Mounting: RECESSED Enclosure:			Volts: Phases: Wires:	-	20	A.I.C. Rating: 10kA Mains Type: MCB Mains Rating: 400.0 A MCB Rating: 400.0 A		
Notes:			Numb		Circuit			
Circuit Description	Trip	Numb er	er of Poles	er of Poles	Numb er	Trip	Circuit Description	
REC-DOG KENNELS	20.0 A	1	1	1	2	-	LTS-DOG KENNELS	
REC-DOG KENNELS	20.0 A	3	1	1	4		LTS-DOG KENNELS	
REC-DOG KENNELS	20.0 A	5	1	1	6		LTS-DOG KENNELS	
GAS POWERED WATER HEATER	20.0 A	7	1	1	8		LTS-OUTDOOR DOG RUN	
SPARE	20.0 A	9	1	1	10		LTS-EXTERIOR	
SPARE	20.0 A	11	1	1	12		SPARE	
SPARE	20.0 A	13	1	1	14		SPARE	
SPARE	20.0 A	15	1	1	16		SPARE	
		17		1	18		SPARE	
DISHWASHER-DOG DISH WASH	'ASH 40.0 A	19	2	1	20		SPARE	
WASHER-DOG LAUNDRY	15.0 A	21 23	2	2	22 24		DRYER-DOG LAUNDRY	
WASHER-DOG LAUNDRY	15.0 A	25 27	2	2	26 28	30.0 A	DYRER-DOG LAUNDRY	
OVERHEAD DOOR-FOOD AND LITTE STORAGE	R 15.0 A	29 31 33	3	3	30 32 34	50.0 A	AS-3	
ALTERNATE:OUTDOOR DOG RUN	15.0 A	35	1	1	36	15.0 A	ALTERNATE:OUTDOOR DOG RUN	
ALTERNATE:DOG RUN OVERHEAD DOOR	15.0 A	37 39 41	3	3	00		ALTERNATE:DOG RUN OVERHEAD DOOR	
ALTERNATE:DOG RUN OVERHEAD DOOR	15.0 A	43 45 47	3	3	44 46 48	15.0 A	ALTERNATE:DOG RUN OVERHEAD DOOR	
ALTERNATE:DOG RUN OVERHEAD	15.0 A	49 51 53	3	3	50 52 54	15.0 A	ALTERNATE:DOG RUN OVERHEAD DOOR	

Panel: SP3 Location: STAFF CORRIDOR Supply From: MDSP Mounting: RECESSED Enclosure:		=	Volts: hases: Wires:	-	20	A.I.C. Rating: 2 Mains Type: MCB Mains Rating: 225.0 A MCB Rating: 225.0 A		
Circuit Description	Rating	Circuit Numb er	er of		Circuit Numb er	Rating	Circuit Description	
LTS-OTHER ANIMALS, DATA CLOSET,		1	1	1	2	20 A	LTS-EXTERIOR	
LTS-SALLYPORT	20 A	3	1	1	4	20 A	LTS-RECEIVING, EUTHANASIA, DOG	
INFRARED HEATER-SALLYPORT	15 A	5	1	1	6	20 A	REC-GROOMING	
REC-SALLYPORT REFRIGERATOR	20 A	7	1	1	8	20 A	REC-EUTHANASIA	
REC-DATA CLOSET	20 A	9	1	1	10	20 A	REC-ANIMAL RECEIVING	
REC-DATA CLOSET	20 A	11	1	1	12	20 A	REC-ANIMAL RECEIVING	
TWIST LOCK REC-DATA CLOSET	30 A	13	1	1	14	20 A	REC-ANIMAL RECEIVING	
TWIST LOCK REC-DATA CLOSET	30 A	15	1	1	16	20 A	REC-ANIMAL RECEIVING	
REC-STAFF FRIDGE	20 A	17	1	1	18	20 A	REC-ACO OFFICE	
REC-STAFF BREAKROOM	20 A	19	1	1	20	20 A	REC-OFFICE DESKS	
REC-BEHAVIOR ASSESMENT	20 A	21	1	1	22	20 A	REC-BUILDING ACCESS CONTROL	
SPARE	20 A	23	1	1	24	20 A	SPARE	
SPARE	20 A	25	1	1	26	20 A	SPARE	
SPARE	20 A	27	1	1	28	20 A	WALK-IN FREEZER LIGHTING AND	
SPARE	20 A	29	1	1	30	20 A	WALK-IN FREEZER CONDENSING UN	
		31		1	32	15 A	EF-2	
OVERHEAD DOOR-SALLYPORT	15 A	33	3	_	34	15 ^	VDEL 1 0 0	
		35	1	2	36	15 A	VRFI-1,2,3	
		37			38			
	45 A	39	3	3	40	15 A	OVERHEAD DOOR-SALLYPORT	
WALK-IN FREEZER ROOFTOP UNIT	1071			1	42	-		



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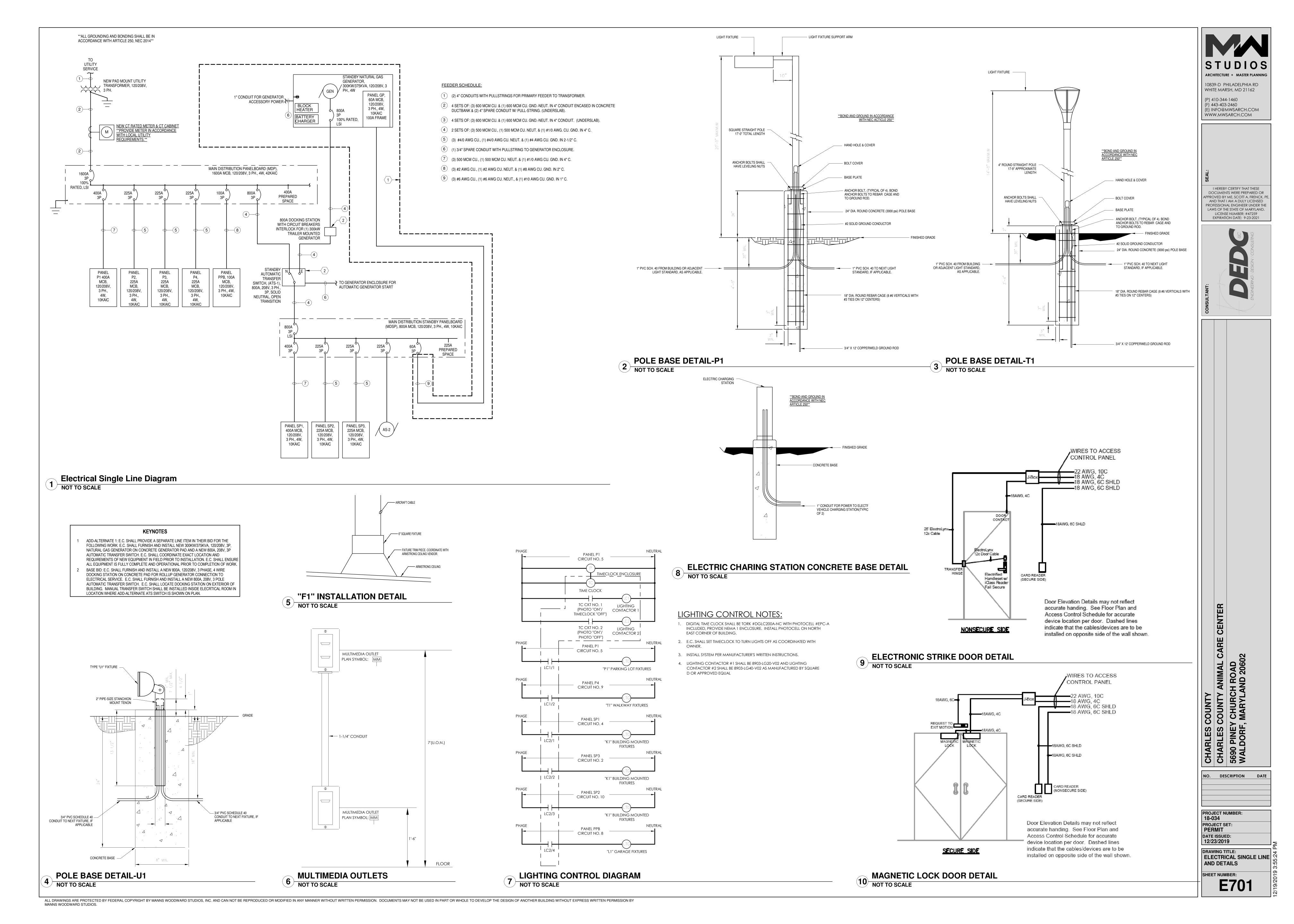


CHARLES COUNTY
CHARLES COUNTY ANIMAL CARE CENTER
5690 PINEY CHURCH ROAD
WALDORF, MARYLAND 20602

PROJECT NUMBER:
18-034
PROJECT SET:
PERMIT
DATE ISSUED:
12/23/2019

DRAWING TITLE:
ELECTRICAL SCHEDULES

NO. DESCRIPTION DATE

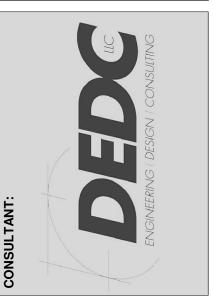


KEYNOTES

ALL DISCONNECTS AND MOTOR STARTERS SHOWN LIGHT SHALL BE PROVIDED BY MECHANCIAL CONTRACTOR. ALL DISCONNECTS AND MOTOR STARTERS SHOWN DARK SHALL BE PROVIDED BY ELECTRICAL CONTRACTOR.



I HEREBY CERTIFY THAT THESE DOCUMENTS WERE PREPARED OR APPROVED BY ME, SCOTT A. FRENCK, PE, AND THAT I AM A DULY LICENSED PROFESSIONAL ENGINEER UNDER THE LAWS OF THE STATE OF MARYLAND. LICENSE NUMBER: #47259 EXPIRATION DATE: 9-23-2021

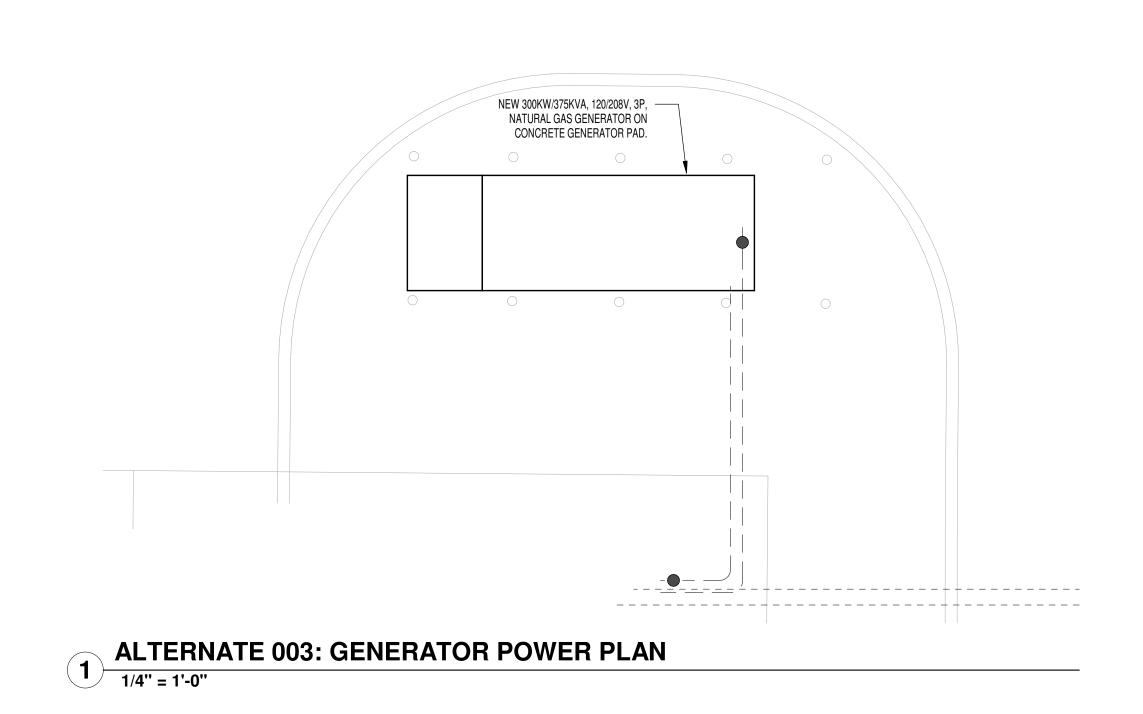


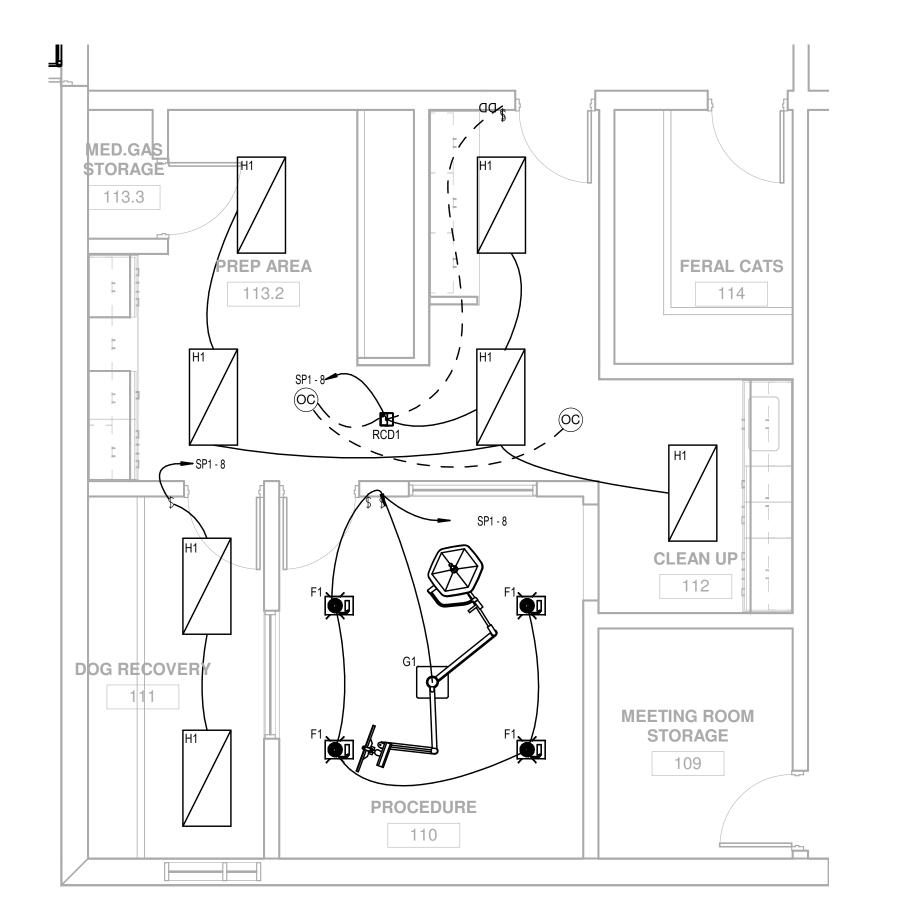
S COUNTY ANIMAL CARE CENTER
SY CHURCH ROAD
F, MARYLAND 20602

NO. DESCRIPTION DATE

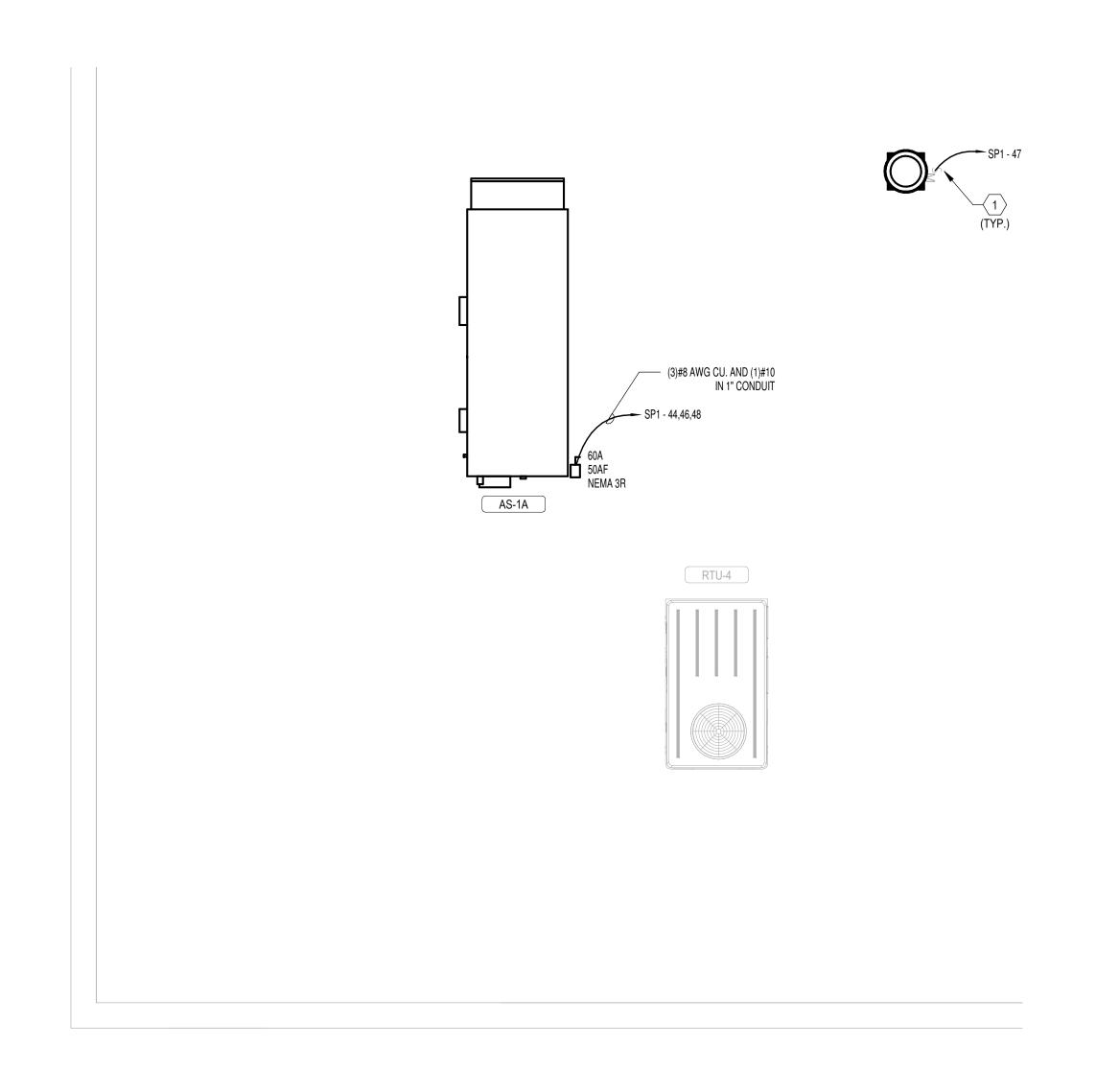
PROJECT NUMBER: 18-034 PROJECT SET: PERMIT DATE ISSUED: 12/23/2019

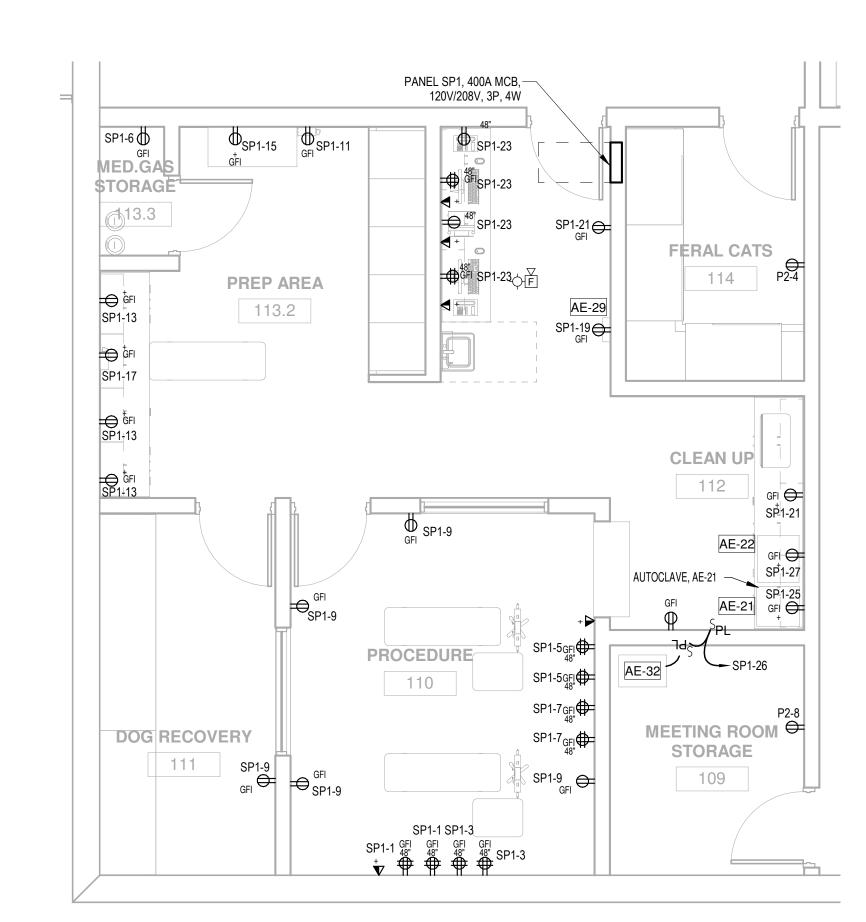
DRAWING TITLE: **ALTERNATES 003 & 004 -**GENERATOR AND SPAY/NEUTER CLINIC SHEET NUMBER:





ALTERNATE 004: SPAY/NEUTER CLINIC - ELECTRICAL LIGHTING PLAN

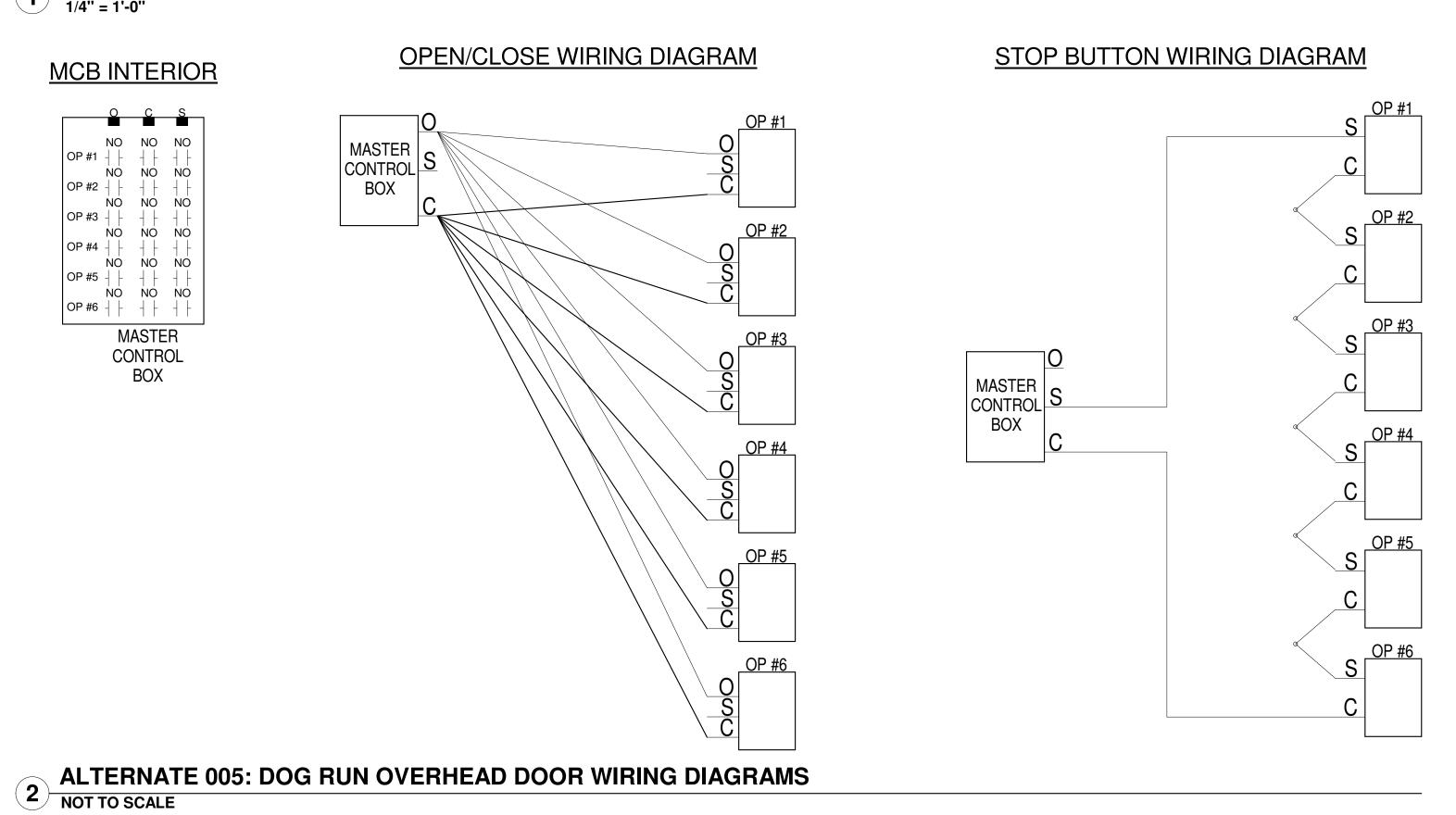




ALTERNATE 004: SPAY/NEUTER CLINIC - ELECTRICAL POWER PLAN1/4" = 1'-0"

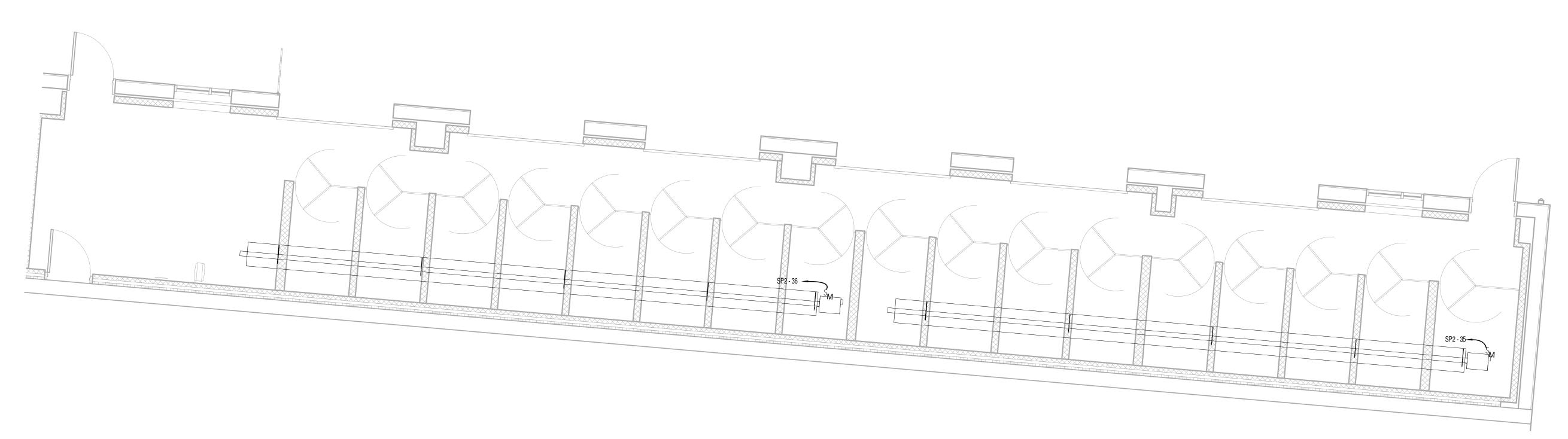
ALTERNATE 004: SPAY/NEUTER CLINIC - ELECTRICAL ROOFTOP NEW WORK PLAN

ALTERNATE 005: OUTDOOR DOG RUN DOORS - ELECTRICAL POWER PLAN 1/4" = 1'-0"



OVERHEAD DOOR WIRING DIAGRAM NOTES

ALL LOW VOLTAGE(24V) WIRING SHALL BE #16 AWG COPPER. ALL LINE VOLTAGE WIRING SHALL BE #12 AWG COPPER. E.C. SHALL COORDINATE ALL WIRING REQUIREMENTS IN FIELD PRIOR TO INSTALLATION.



ALTERNATE 006: OUTDOOR DOG RUN HEATERS - ELECTRICAL POWER PLAN

1/4" = 1'-0"

10839-d Philadelphia RD White Marsh, MD 21162 (P) 410-344-1460 (F) 443-403-2460 (E) INFO@MWSARCH.COM

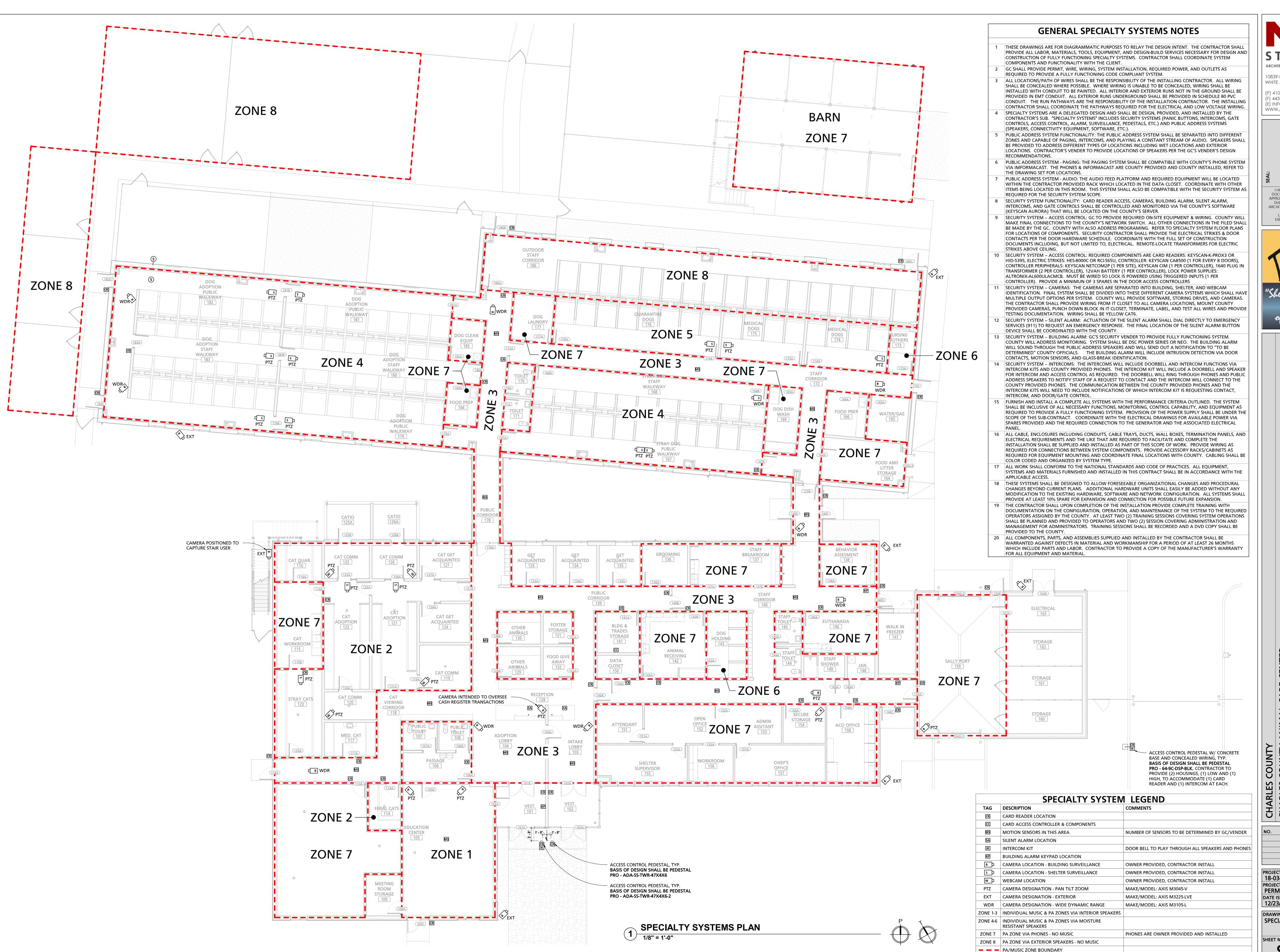
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DESCRIPTION DATE

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> DRAWING TITLE: **ALTERNATES 005 & 006** -OUTDOOR DOG RUN ALTERNATES



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(F) 443-403-2460

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EXPIRATION DATE: 8-18-2020



CHARLES COUNTY ANIMAL CARE CEN 5690 PINEY CHURCH ROAD WALDORF, MARYLAND 20602

DESCRIPTION DATE

PROJECT NUMBER:
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PROJECT SET:
PERMIT
DATE ISSUED:

PERMIT
DATE ISSUED:
12/23/2019

DRAWING TITLE:
SPECIALTY SYSTEMS